

VENTANA MWS-260-BN SERIES CURTAINWALL SYSTEM

GENERAL NOTES

GENERAL NOTES:

- 1. THIS SYSTEM HAS BEEN DESIGNED AND TESTED TO MEET ALL OF THE REQUIREMENTS OF THE 8TH EDITION (2023) FLORIDA BUILDING CODE, FOR USE OUTSIDE OF THE HIGH VELOCITY HURRICANE ZONE.
- 2. THIS SYSTEM HAS BEEN TESTED PER TAS 201, 202, 203, AND AAMA 501. THIS SYSTEM IS SMALL MISSILE IMPACT RESISTANT, SHUTTERS ARE NOT REQUIRED WHEN INSTALLED MORE THAN 30 FT ABOVE GROUND.
- 3. DESIGN WIND LOADS MUST BE CALCULATED BY A PROFESSIONAL ENGINEER OR ARCHITECT FOR EACH PROJECT. THE (ASD) PROJECT WIND LOADS CANNOT EXCEED THE MAX DESIGN PRESSURES LISTED FOR THIS SYSTEM.
- 4. ANCHOR TYPE, SIZE, SPACING, AND EMBEDMENT SHALL BE AS SHOWN IN THE DETAILS AND AS LISTED IN THE ANCHOR CHARTS ON SHEETS 6-7, 10-12, & 39-30. ANCHOR EMBEDMENT IN SUBSTRATE SHALL BE BEYOND WALL DRESSING OR STUCCO.
- 5. THE DESIGN PRESSURES LISTED FOR GLASS TYPE GL-2 ARE BASED ON TESTED PRESSURES, ASTM E1300, AND THE ALLOWABLE STRESS OF THE STRUCTURAL SILICONE FOR SSG MULLIONS.
- 6. THE DESIGN OF THE SUBSTRATE IS THE RESPONSIBILITY OF THE ENGINEER OF RECORD OR OTHER SPECIALTY ENGINEER, AND IS NOT A PART OF THIS APPROVAL. THE SUBSTRATE MUST SAFELY TRANSFER THE LOADS APPLIED TO THIS SYSTEM TO THE BUILDING STRUCTURE.
- 7. THE INSTALLATION DETAILS SHOWN IN THIS APPROVAL ARE GENERIC. SITE SPECIFIC DETAILS THAT VARY FROM THE CONDITIONS SHOWN MUST BE APPROVED BY A FLORIDA LICENSED ENGINEER OR ARCHITECT AND THE LOCAL BUILDING OFFICIAL.
- 8. WOOD BUCKS (OPTIONAL) ARE BY OTHERS AND MUST BE ADEQUATELY ANCHORED TO PREVENT FASTENER BENDING.
- 9. ALL ANCHORS SECURING THE SYSTEM THAT COME INTO CONTACT WITH PRESSURE TREATED WOOD SHALL BE CAPABLE OF RESISTING CORROSION CAUSED BY THE CHEMICALS IN THE WOOD.
- 10.MATERIALS INCLUDING BUT NOT LIMITED TO STEEL/METAL SCREWS THAT COME INTO CONTACT WITH OTHER DISSIMILAR MATERIALS SHALL BE PROTECTED TO PREVENT GALVANIC REACTIONS PER FBC REQUIREMENTS.
- 11.FIRE RATINGS OR FIRE RESISTANCE IS NOT A PART OF THIS REVIEW.
- 12.NO INCREASE IN ALLOWABLE STRESS HAS BEEN USED IN THE DESIGN OF THIS PRODUCT. Cd=1.6 WAS USED FOR WOOD SCREWS ONLY.
- 13.CODE REQUIREMENTS FOR SAFE GUARDS MUST BE OBSERVED.

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SEAL

SCOTT WOLTERS
FL PE# 62354

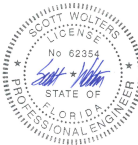
WOLTERS ENGINEERING
(CDA# 27194)
15211 97TH ROAD N
WEST PALM BEACH, FL 33412
(561) 225-1982

VENTANA

DESIGN-BUILD SYSTEMS

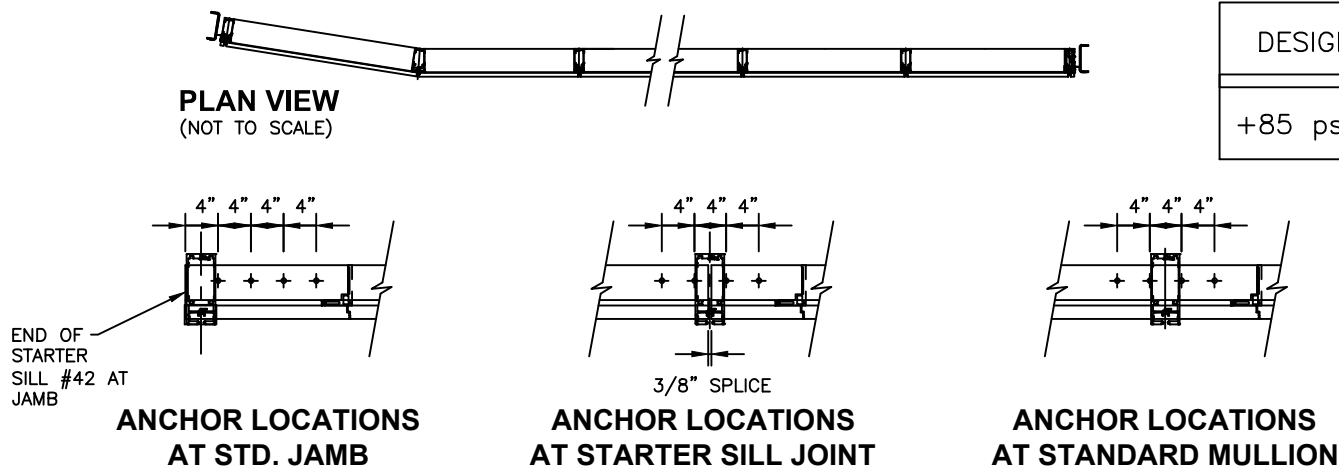
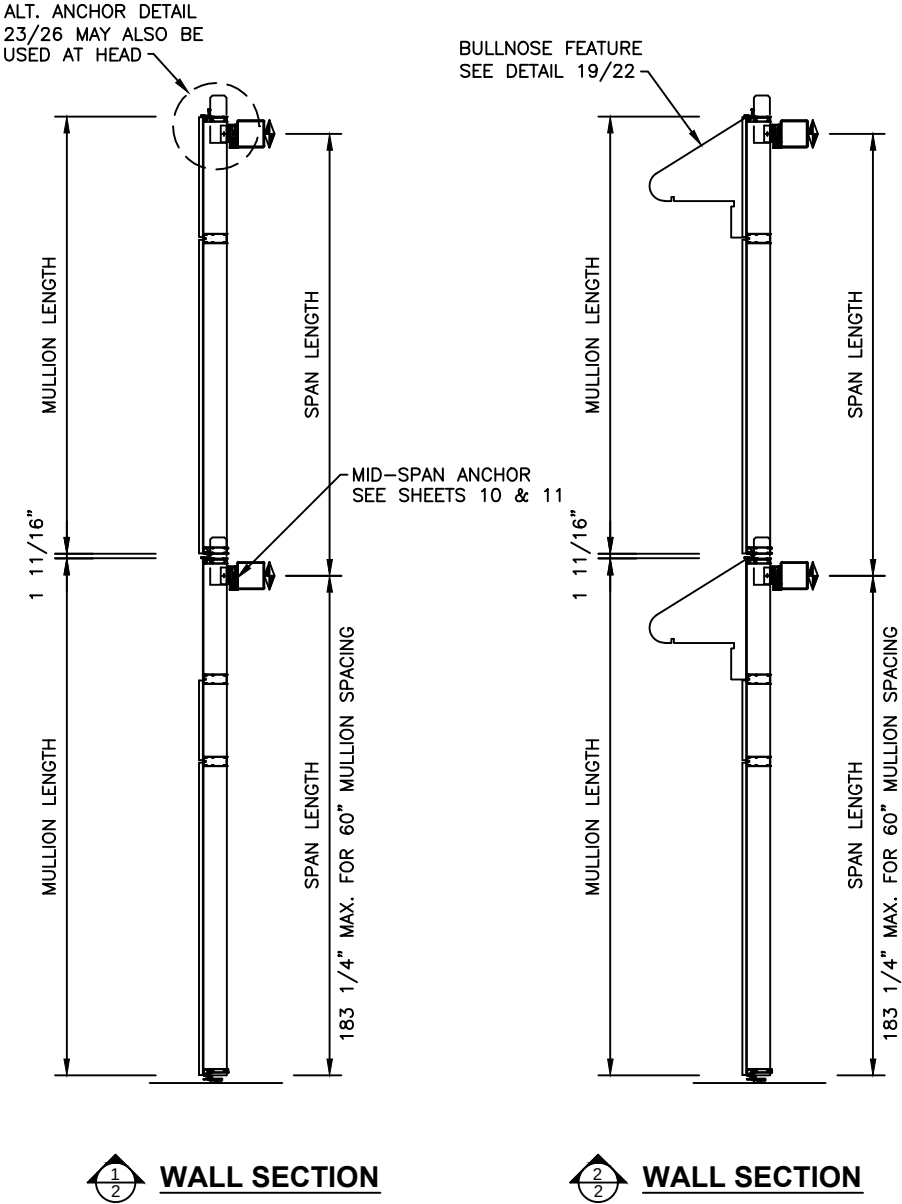
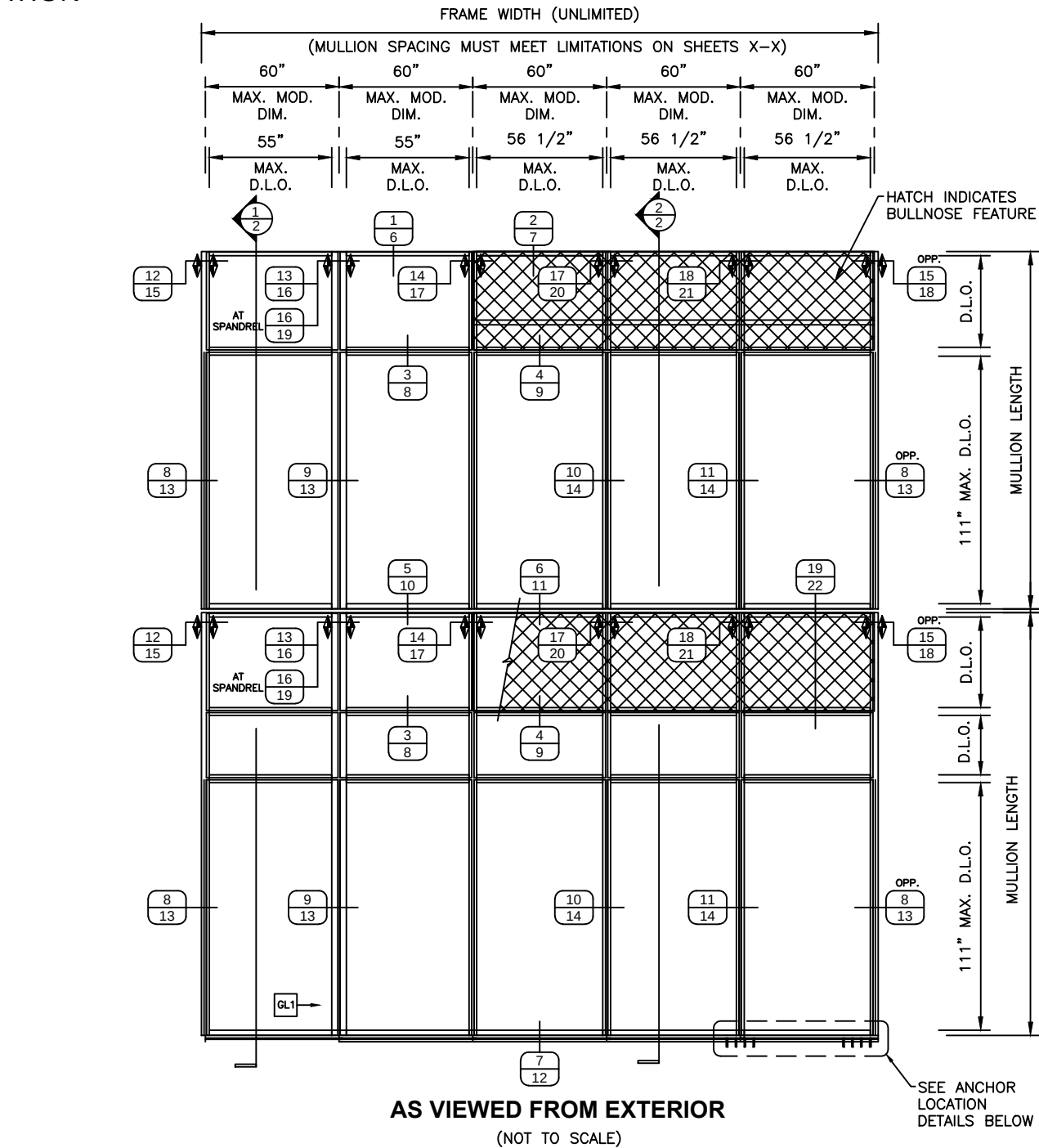
35 EAST WACKER, SUITE 1400
CHICAGO, IL 60601

PH: (312) 239-1570
www.ventana.vc



Digitally signed
by Scott Wolters
Date: 2026.04.16
01:31:43 -05'00'

MULTI- SPAN ELEVATION



MULTI-SPAN MULLION NOTES:

ALL MULTI-SPAN VERTICAL MULLIONS MUST MEET THE FOLLOWING REQUIREMENTS:

1. MAX. SPAN TRIB. AREA = 76.4 sqft (MULLIONS)
40.4 sqft (JAMBS)

SPAN TRIB. AREA = ANCHOR-TO-ANCHOR
SPAN HEIGHT x MULLION SPACING (SPACING/2 AT JAMBS)

2. MAX. DEFLECTION = L/180.

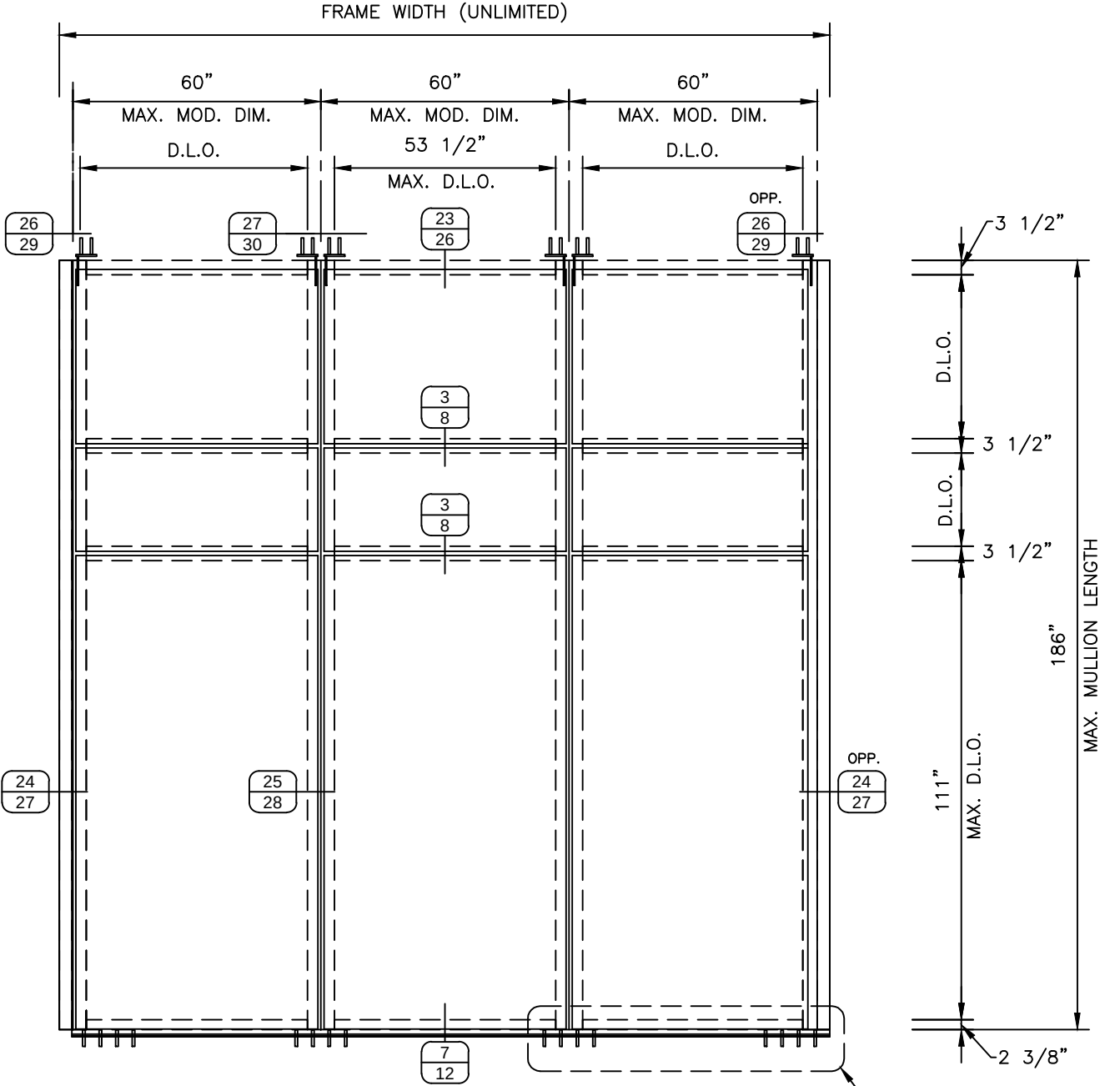
3. MAX. END REACTION = 4054 lb (MULLIONS)
2145 lb (JAMBS)

4. MAX. MID-SPAN REACTION = 8239 lb (MULLIONS)
4360 lb (JAMBS)

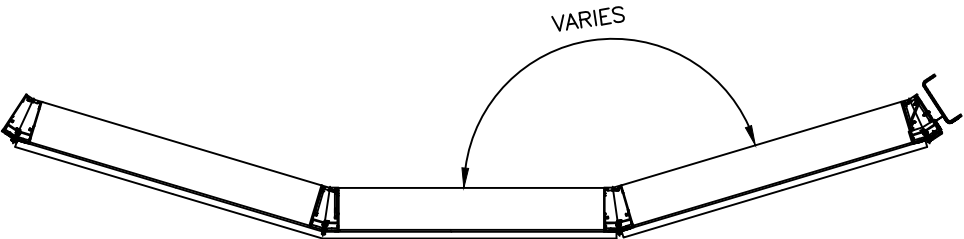
5. MAX. BENDING MOMENT = 179,310 in-lb (MULLIONS)
94,878 in-lb (JAMBS)

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1ST SUBMITTAL						PRINTS ISSUED FOR
SCOTT VOLTERS FL PE# 62354						SEAL
VOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982						
VENTANA DESIGN-BUILD SYSTEMS						
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DWG: MWS260BN-SM						
SHEET: 2/37						

SINGLE SPAN ELEVATION



AS VIEWED FROM EXTERIOR
(NOT TO SCALE)

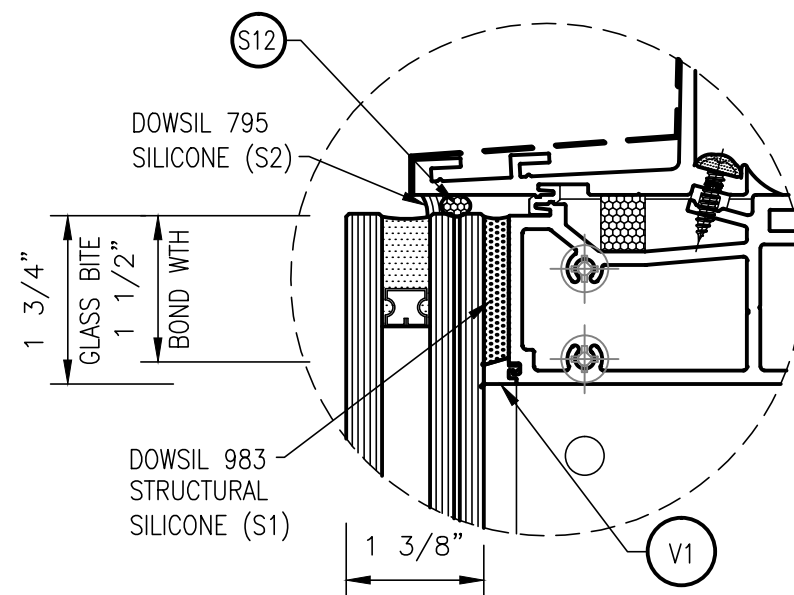


PLAN VIEW
(NOT TO SCALE)

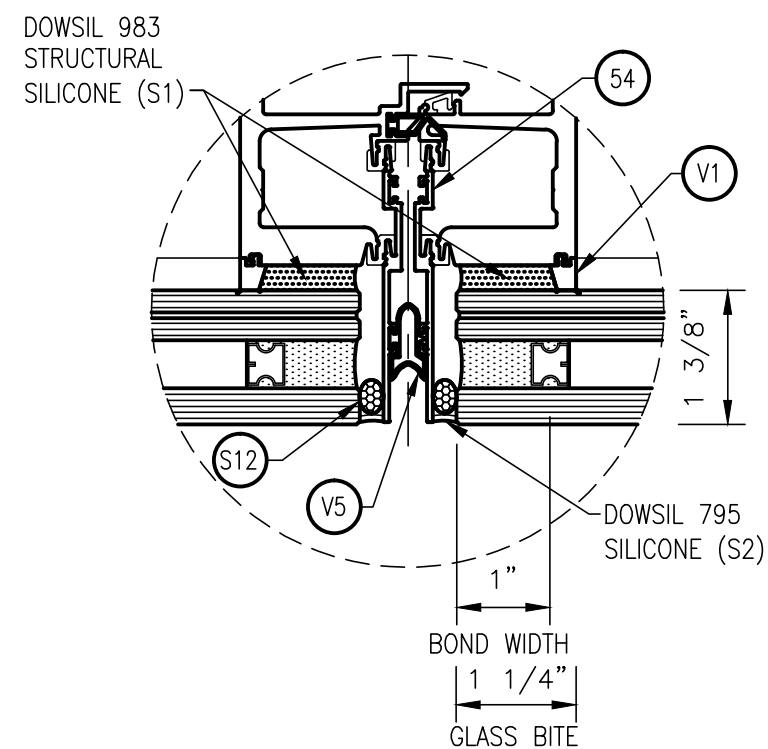
DESIGN PRESSURE
+/- 80 Psf

SEAL:		SCOTT WOLTERS FL PE# 62354		1ST SUBMITTAL		2/26/26	
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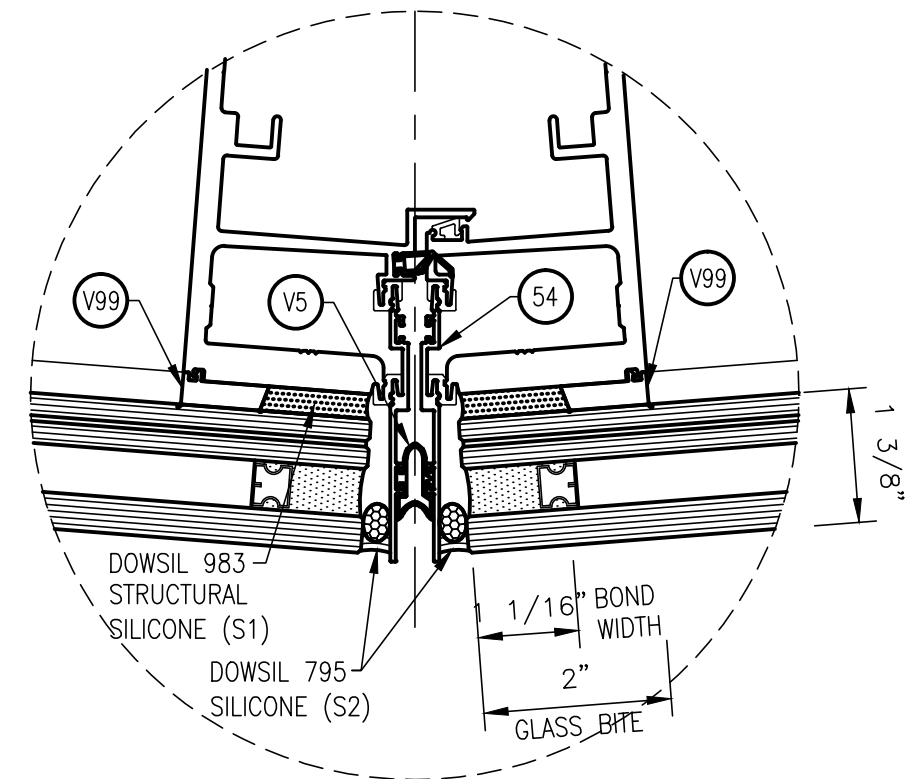
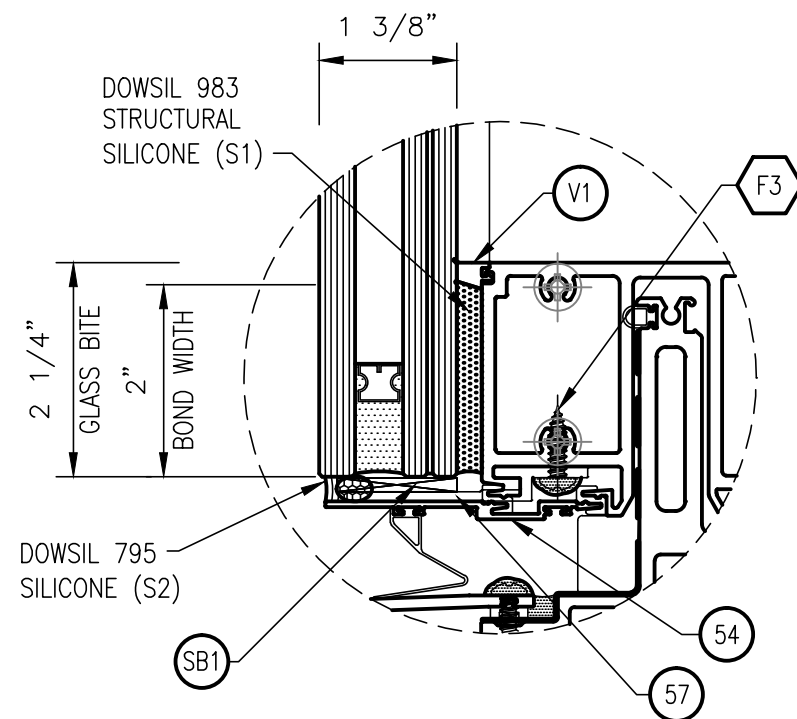
GLAZING DETAILS



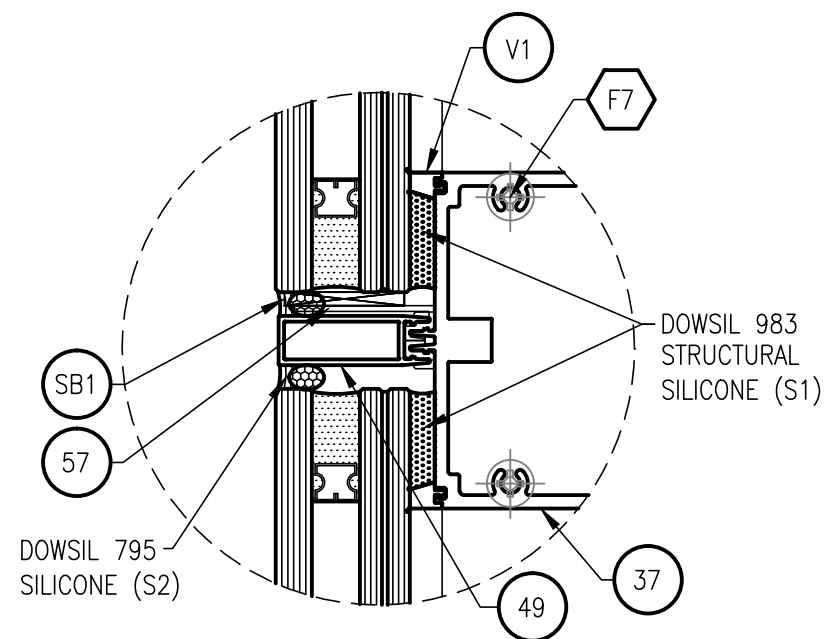
STANDARD HEAD



STANDARD MULLION

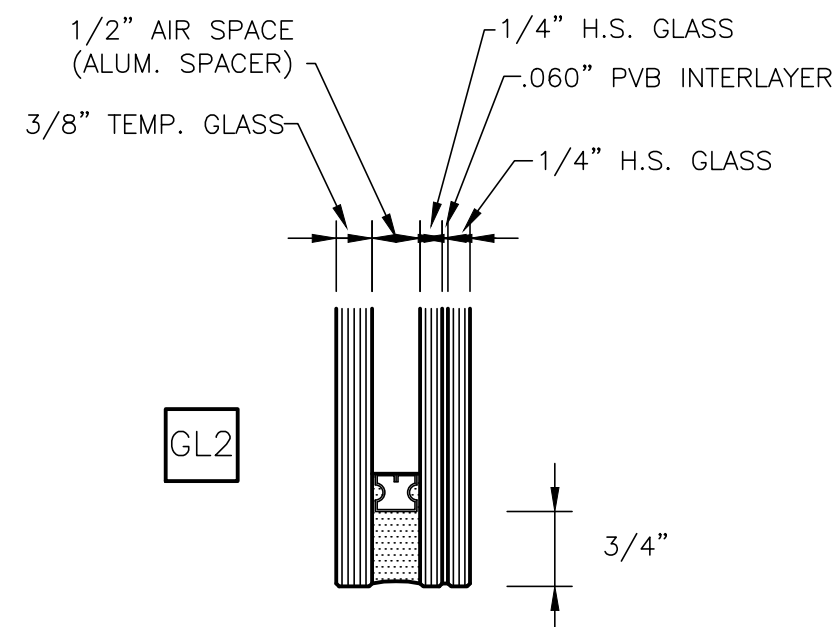
SPLAYED MULLIONS

STANDARD SILL



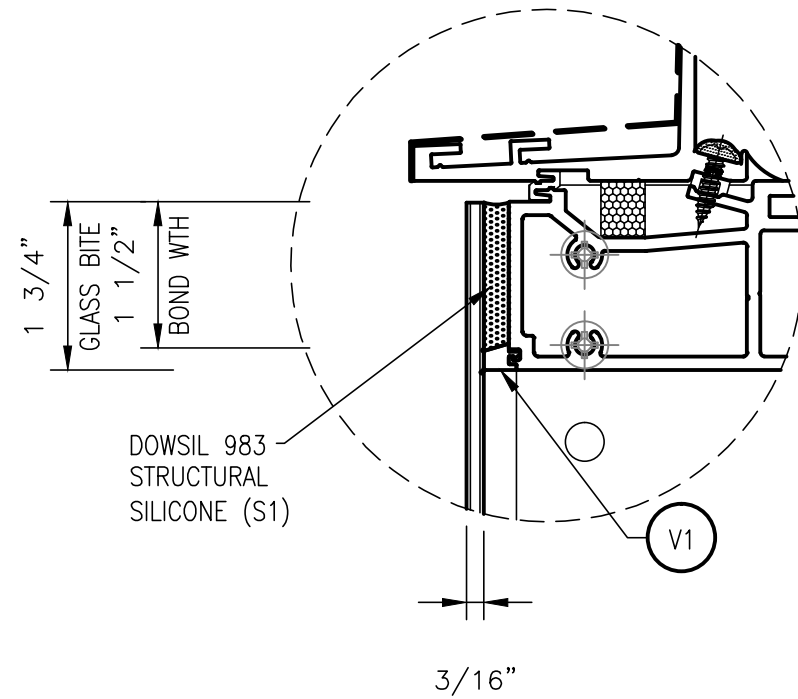
INT. HORIZONTAL

APPROVED GLASS TYPES

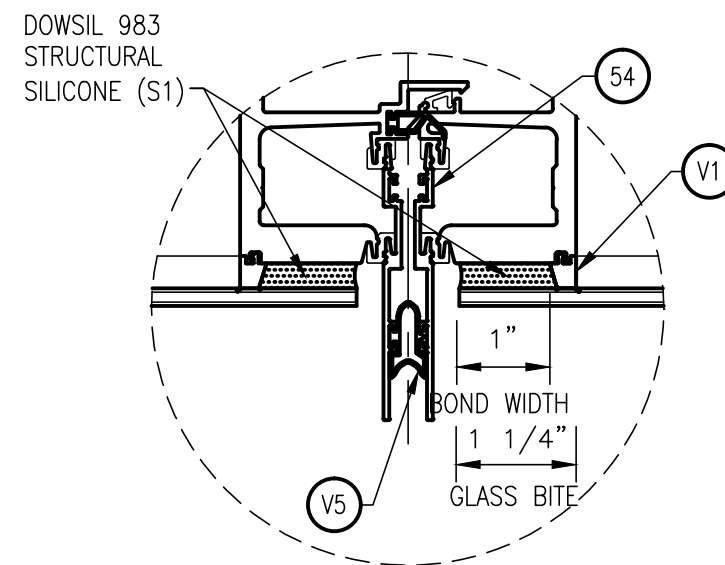


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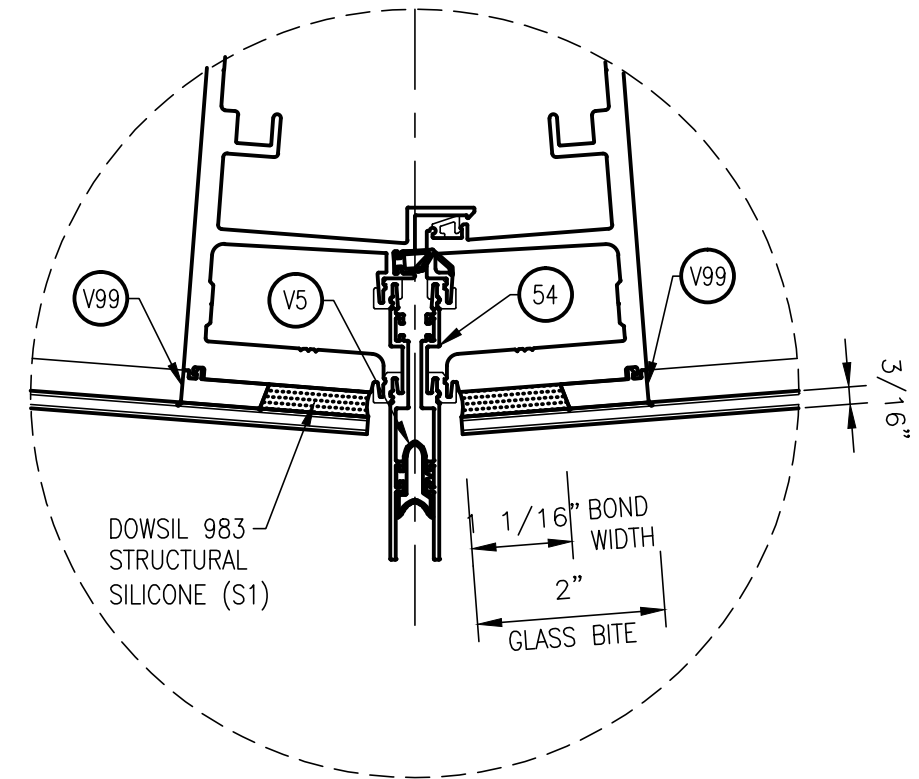
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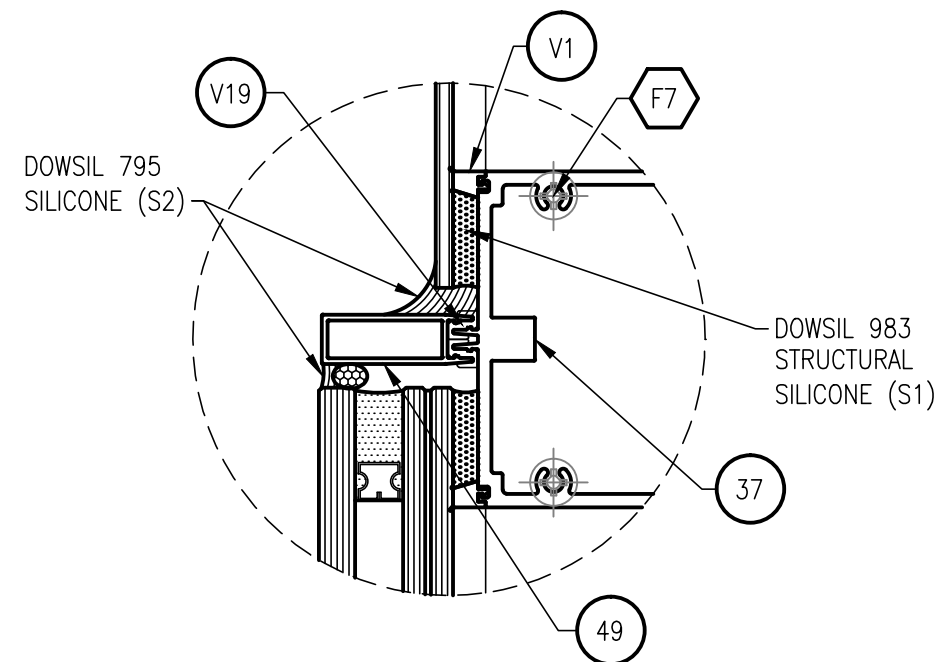
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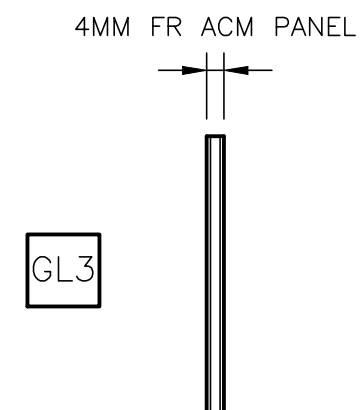
STANDARD MULLION



SPLAYED MULLIONS

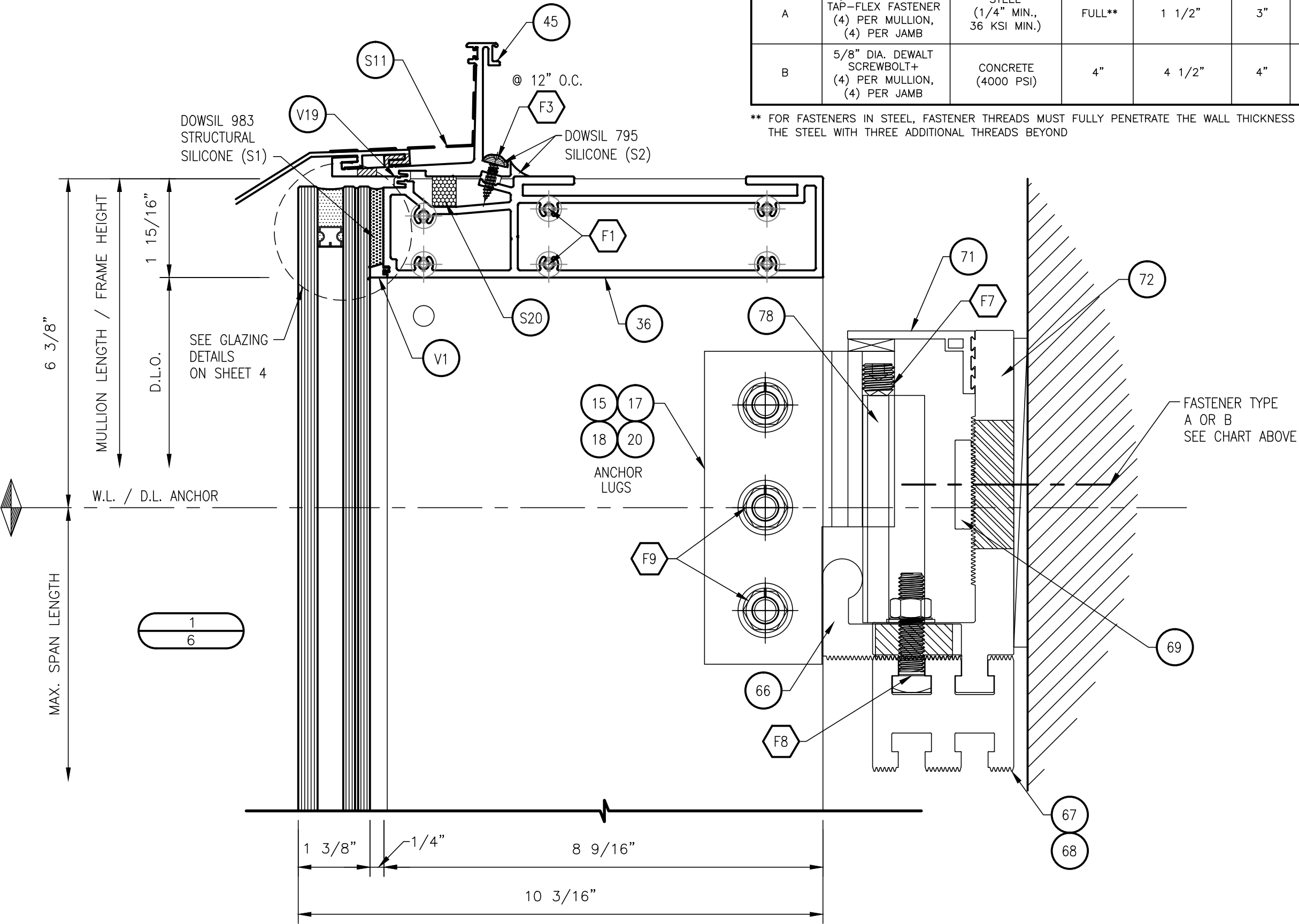


STANDARD INT. HORIZONTAL



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SEAL:		SCOTT WOLTERS FL PE# 62354	
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HEAD DETAIL AT VISION PANEL



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SHEET: 6/37

SCOTT VOLTERS
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SEAL: [Stamp]

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FL PE# 62354

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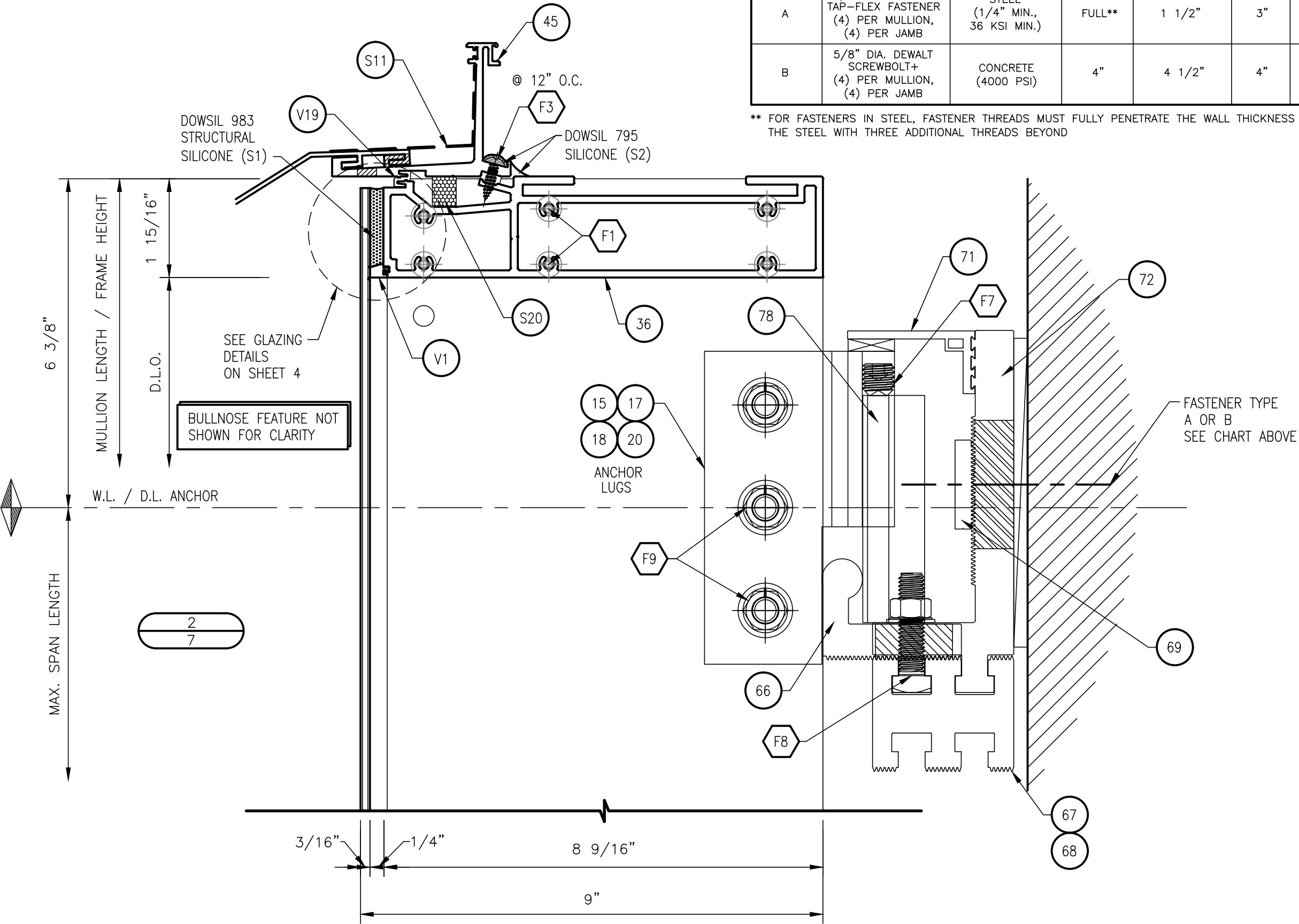
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2/26/26

DATE

HEAD DETAIL AT SPANDREL PANEL



** FOR FASTENERS IN STEEL, FASTENER THREADS MUST FULLY PENETRATE THE WALL THICKNESS OF THE STEEL WITH THREE ADDITIONAL THREADS BEYOND

ANCHOR SCHEDULE (MID-SPAN ANCHORS AT HEAD)							
FASTENER TYPE	DESCRIPTION	BASE MATERIAL	EMBEDMENT	EDGE DISTANCE	SPACING (MIN.)	MAXIMUM MULLION END REACTION (LB)	MAXIMUM JAMB END REACTION (LB)
A	5/8" DIA. DEWALT TAP-FLEX FASTENER (4) PER MULLION, (4) PER JAMB	STEEL (1/4" MIN., 36 KSI MIN.)	FULL**	1 1/2"	3"	8239	4360
B	5/8" DIA. DEWALT SCREWBOLT+ (4) PER MULLION, (4) PER JAMB	CONCRETE (4000 PSI)	4"	4 1/2"	4"	8239	4360

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DWG:
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SEAL:
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FL PE# 62354
VOLTERS ENGINEERING
(CDA# 27194)
15211 97TH ROAD N
WEST PALM BEACH, FL 33412
(561) 225-1982

APR 30 2008

PROFESSIONAL SEAL

STATE OF FLORIDA

REGISTERED PROFESSIONAL ENGINEER

NO. 62354

SCOTT VOLTERS

1ST SUBMITTAL

PRINTS ISSUED FOR

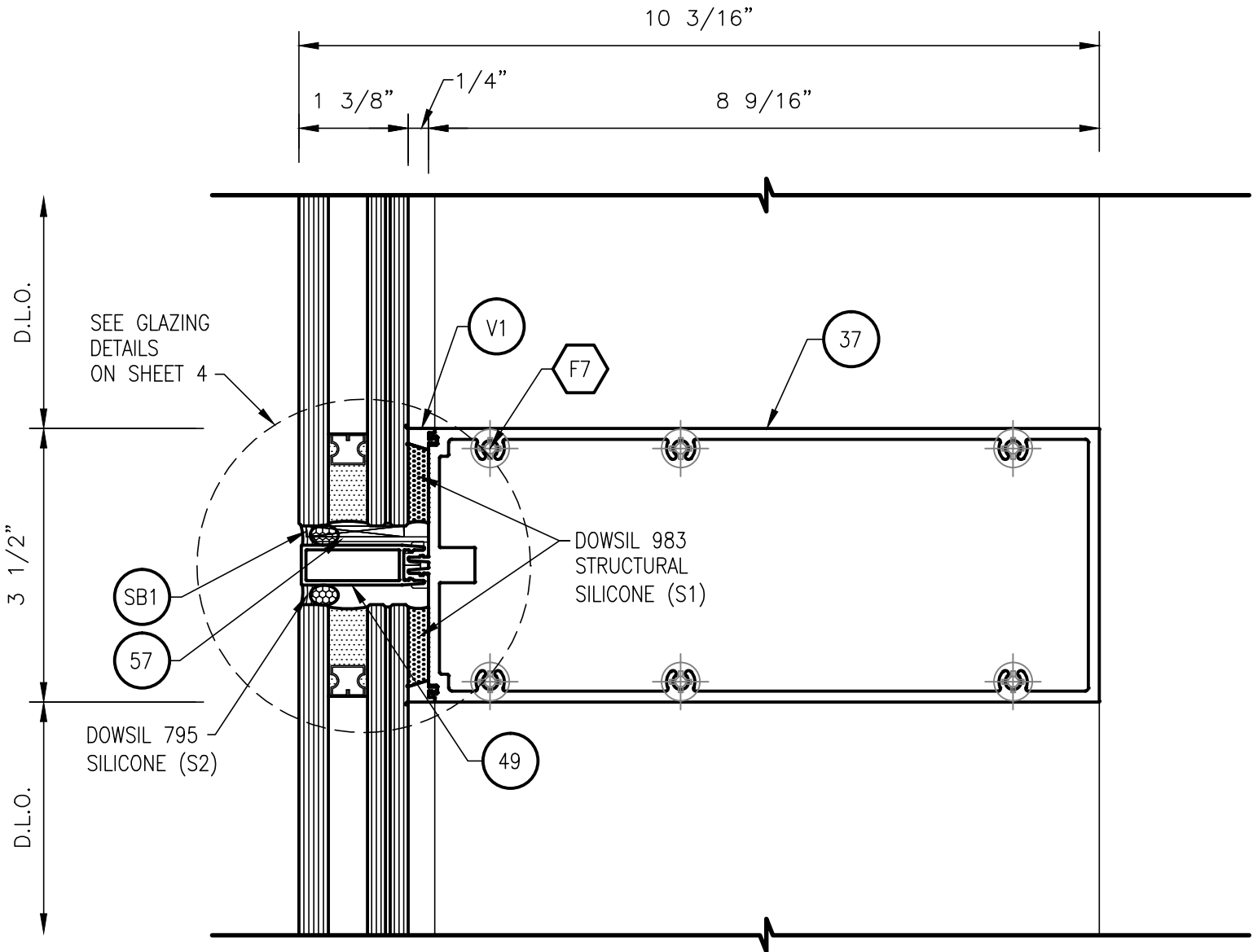
REV #

2/26/26

DATE

INT. HORIZONTAL DETAIL
(VISION TO VISION)

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DWG: MWS260BN-SM		35 EAST WACKER, SUITE 1400 CHICAGO, IL 60601		PH: (312) 239-1570 www.ventana.vc	
SHEET: 8/37		VENTANA DESIGN-BUILD SYSTEMS		SCOTT VOLTERS FL PE# 62354 VOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982	
SEAL:		SEE GLAZING DETAILS ON SHEET 4		SCOTT VOLTERS FL PE# 62354 VOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982	
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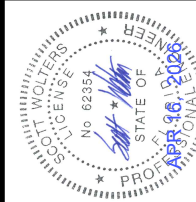
(SPANDREL TO VISION)



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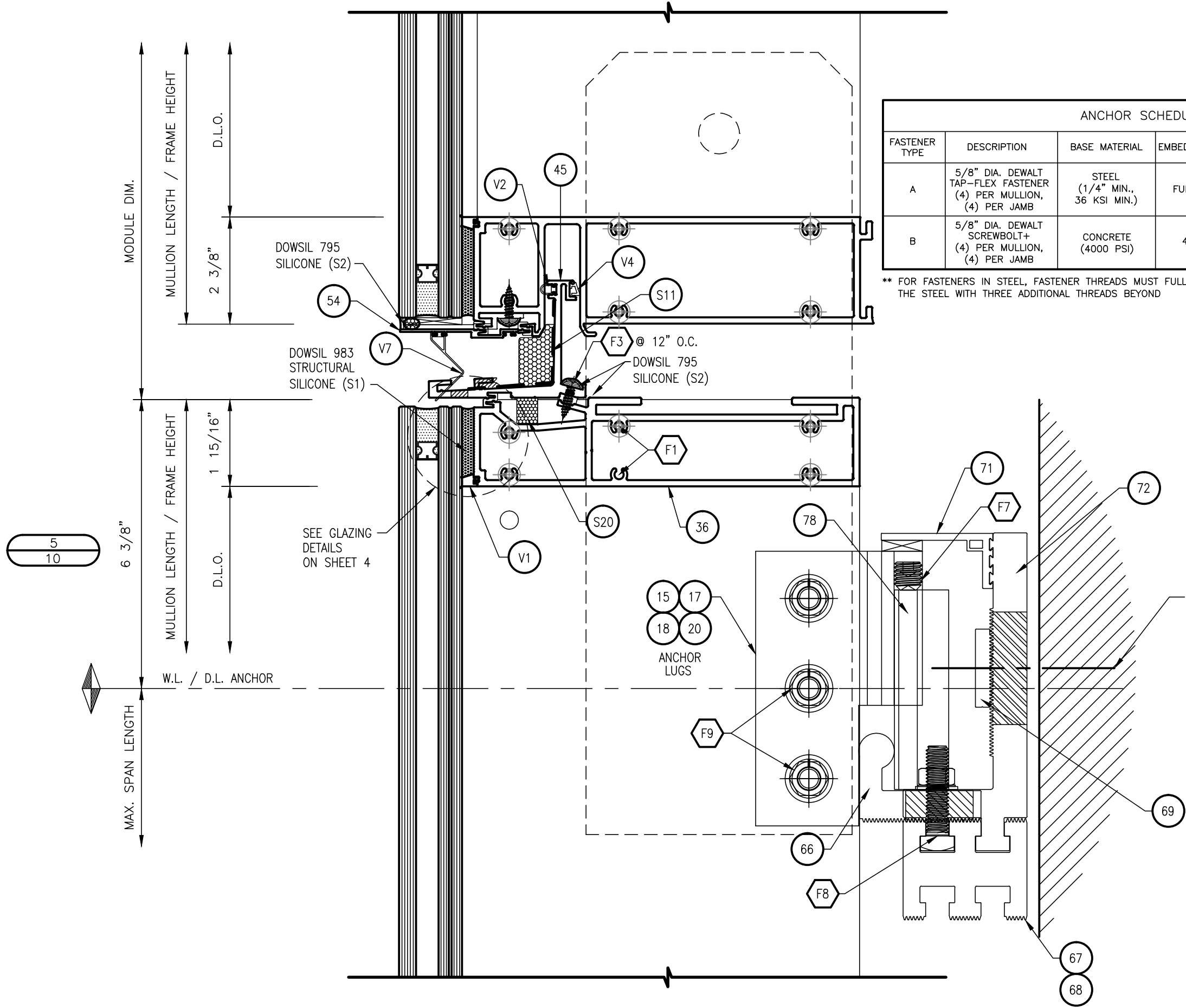
SCOTT WOLTERS
FL PE# 62354

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1ST SUBMITTAL		-	2/26/26
PRINTS ISSUED FOR	REV.#	DATE	

STACK JOINT DETAIL
(VISION TO VISION)



ANCHOR SCHEDULE (MID-SPAN ANCHORS)							
FASTENER TYPE	DESCRIPTION	BASE MATERIAL	EMBEDMENT	EDGE DISTANCE	SPACING (MIN.)	MAXIMUM MULLION END REACTION (LB)	MAXIMUM JAMB END REACTION (LB)
A	5/8" DIA. DEWALT TAP-FLEX FASTENER (4) PER MULLION, (4) PER JAMB	STEEL (1/4" MIN., 36 KSI MIN.)	FULL**	1 1/2"	3"	8239	4360
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DWG: MWS260BN-SM

SHEET: 10/37

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SEAL: [Professional Engineer Seal]

1ST SUBMITTAL

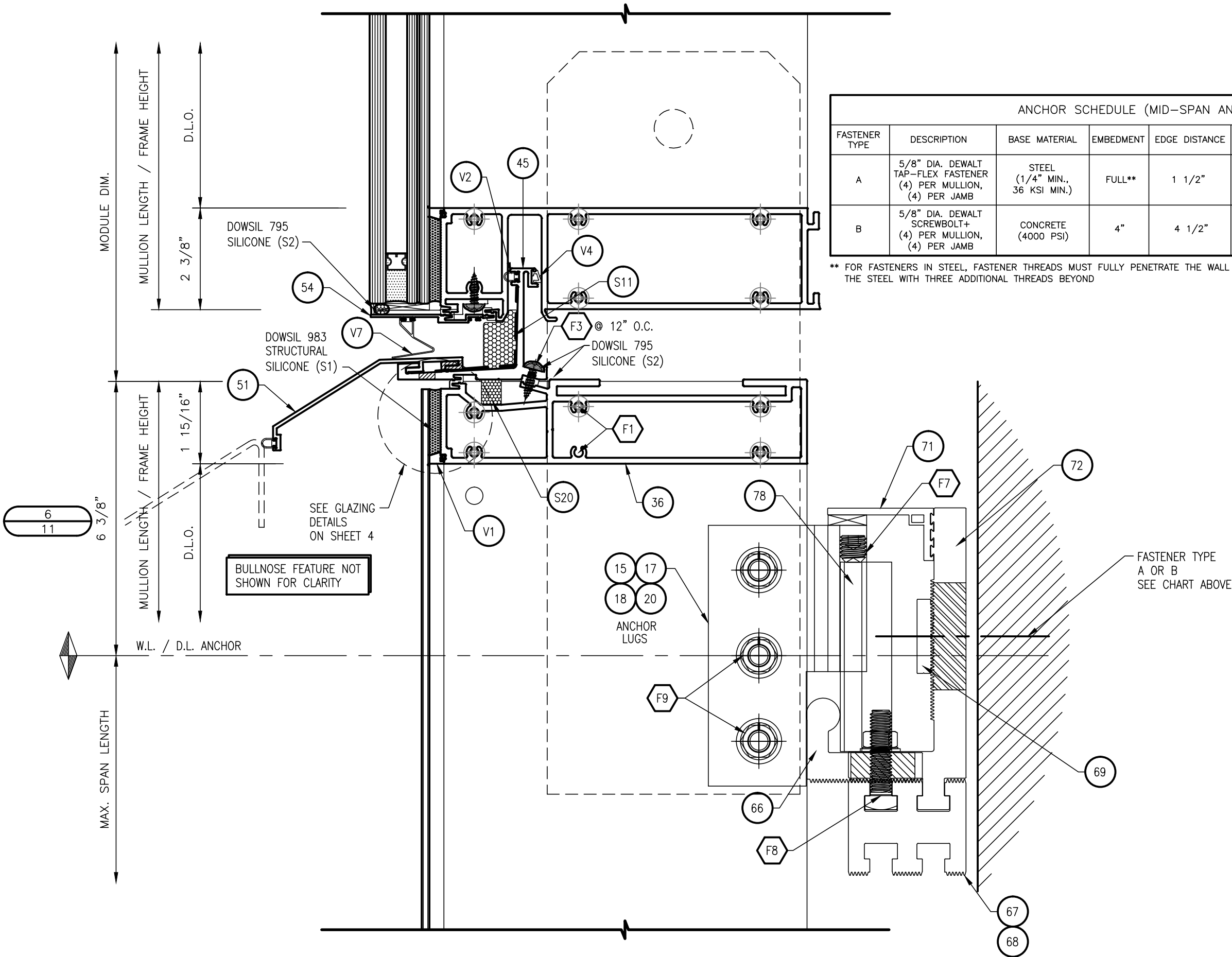
PRINTS ISSUED FOR

REV #

2/26/26

DATE

STACK JOINT DETAIL
(VISION TO SPANDREL)



ANCHOR SCHEDULE (MID-SPAN ANCHORS)							
FASTENER TYPE	DESCRIPTION	BASE MATERIAL	EMBEDMENT	EDGE DISTANCE	SPACING (MIN.)	MAXIMUM MULLION END REACTION (LB)	MAXIMUM JAMB END REACTION (LB)
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DWG: MWS260BN-SM

SHEET: 11/37

SCOTT VOLTERS
FL PE# 62354

WOLTERS ENGINEERING
(CDA# 27194)
15211 97TH ROAD N
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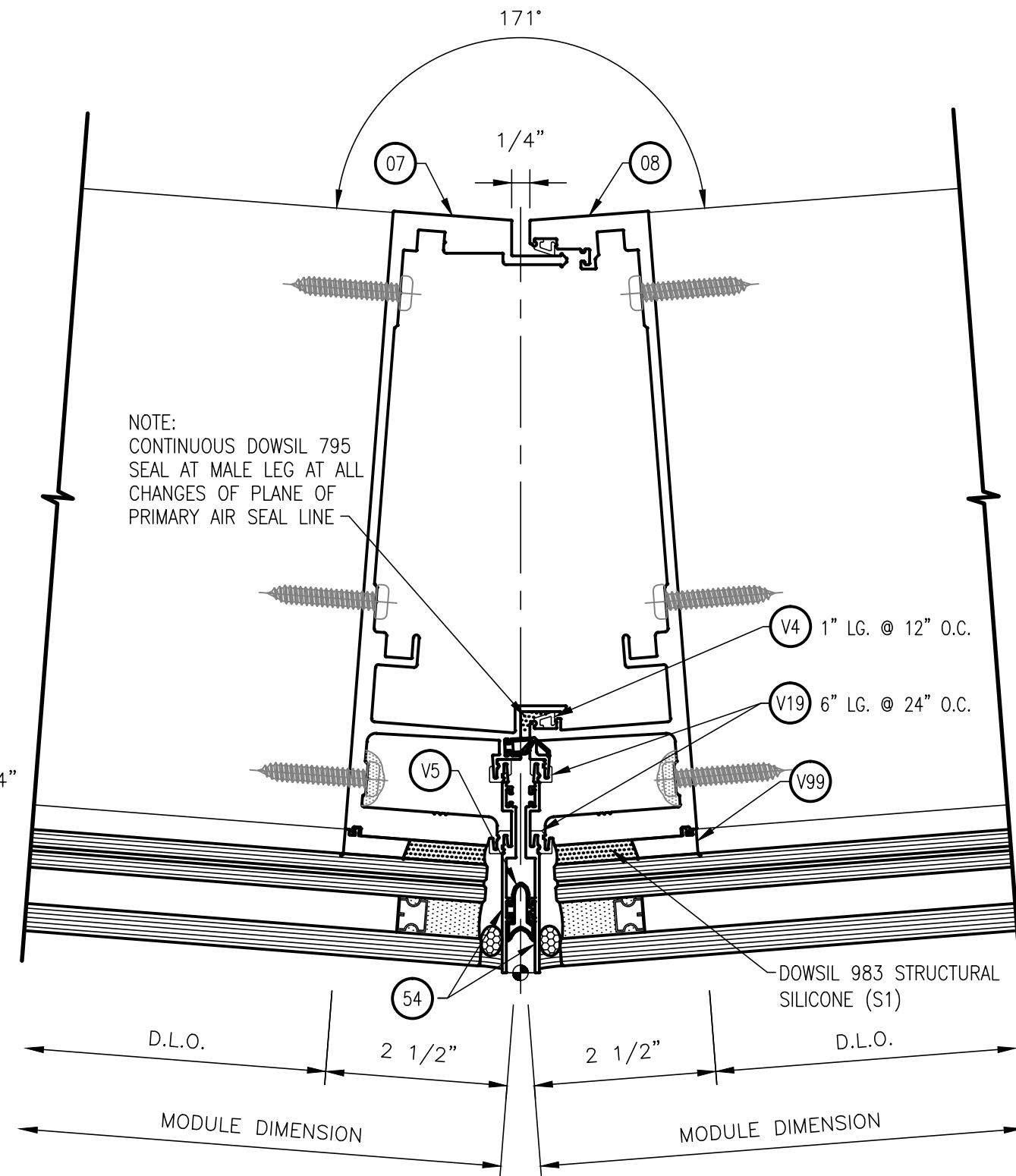
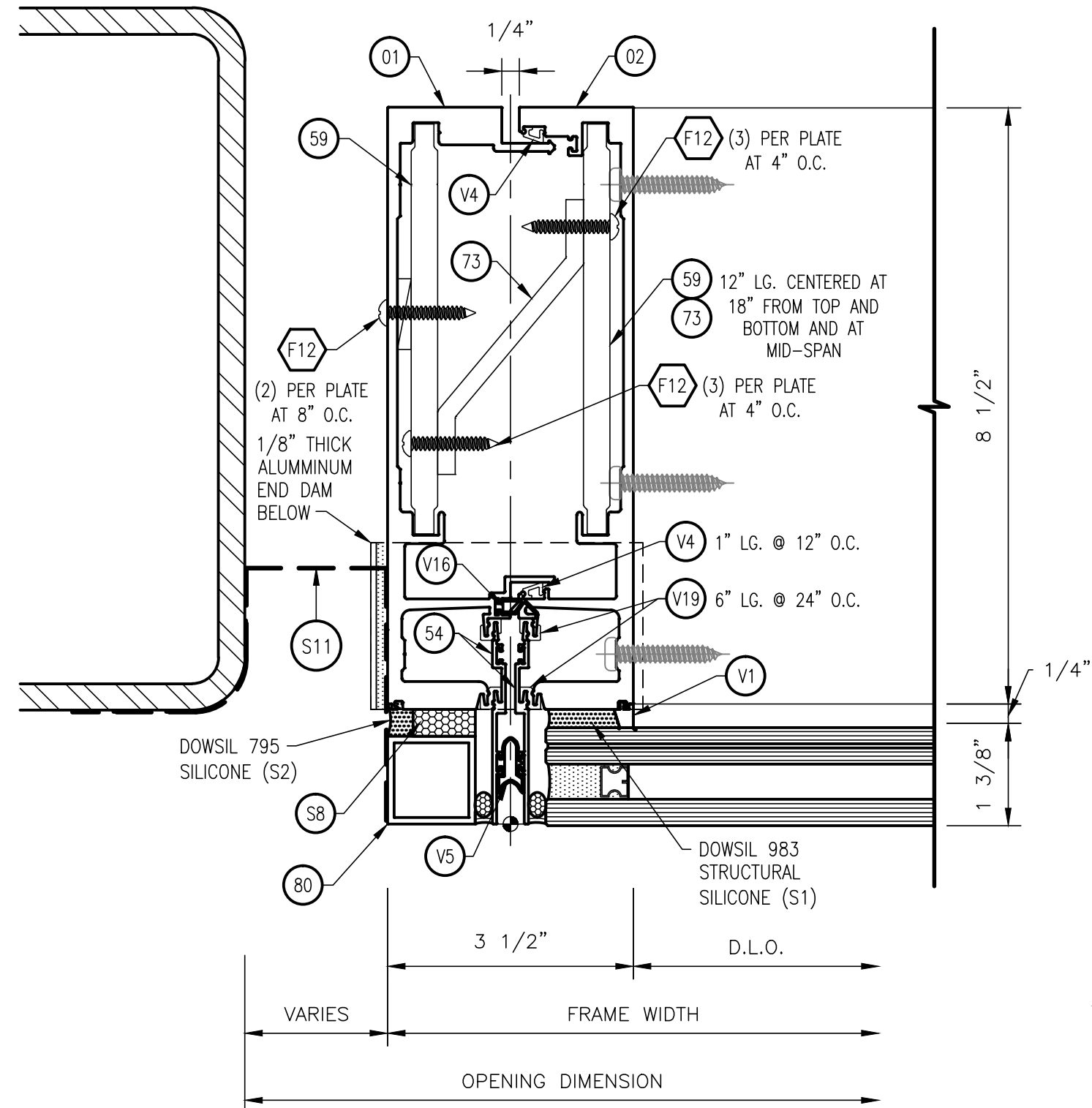
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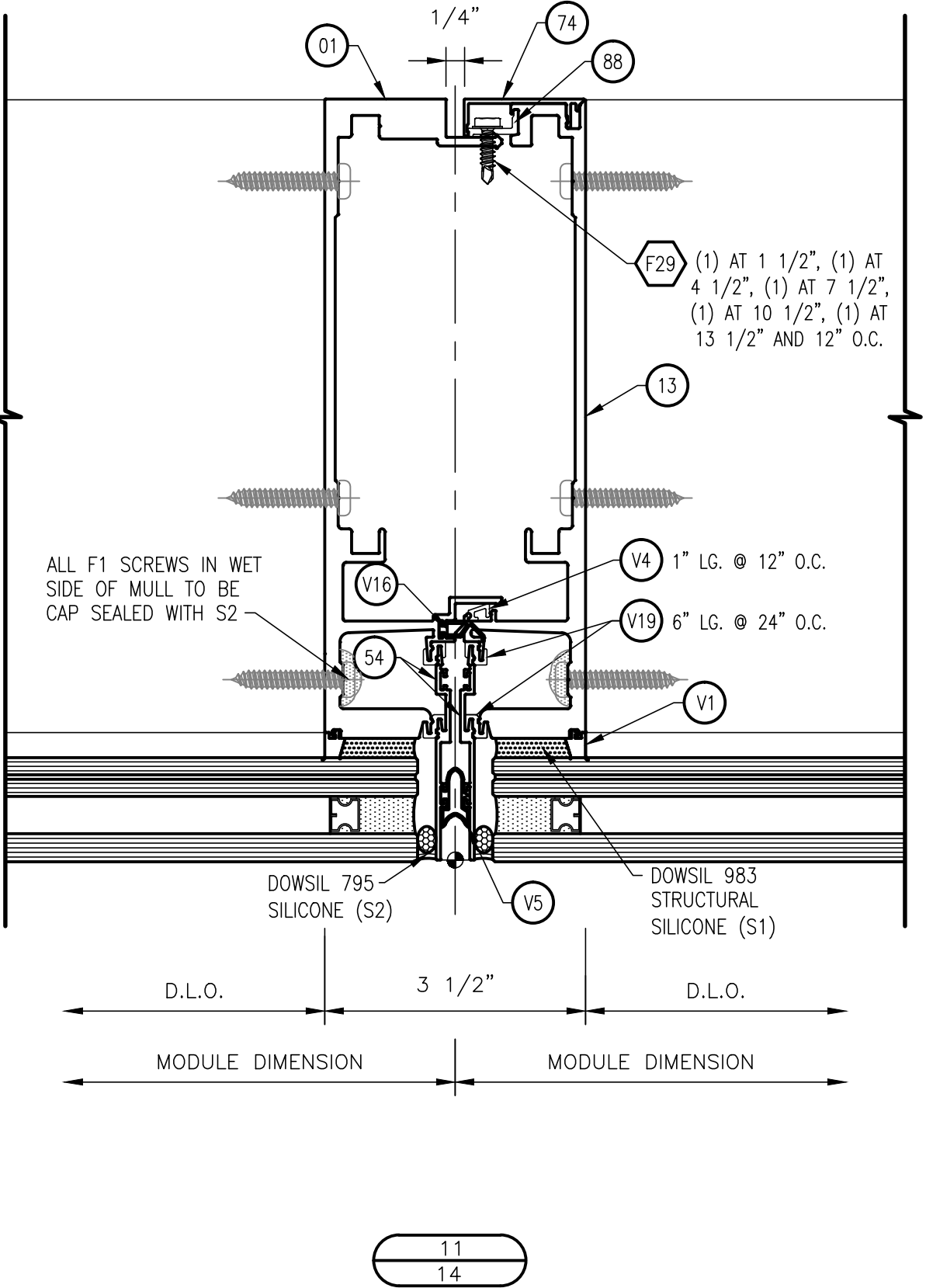
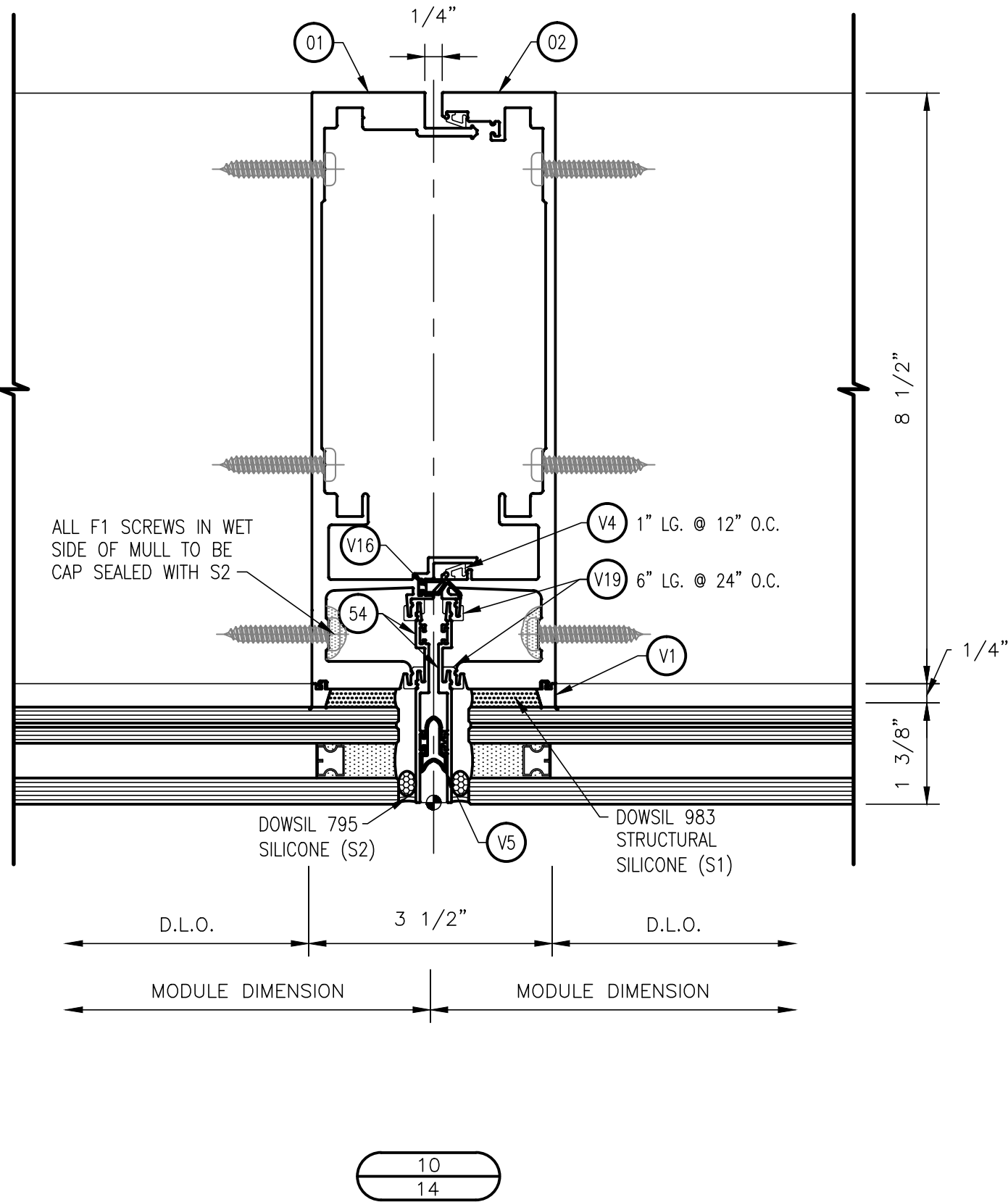
2/26/26

DATE

STD. JAMB AND SPLAYED MULLION DETAILS

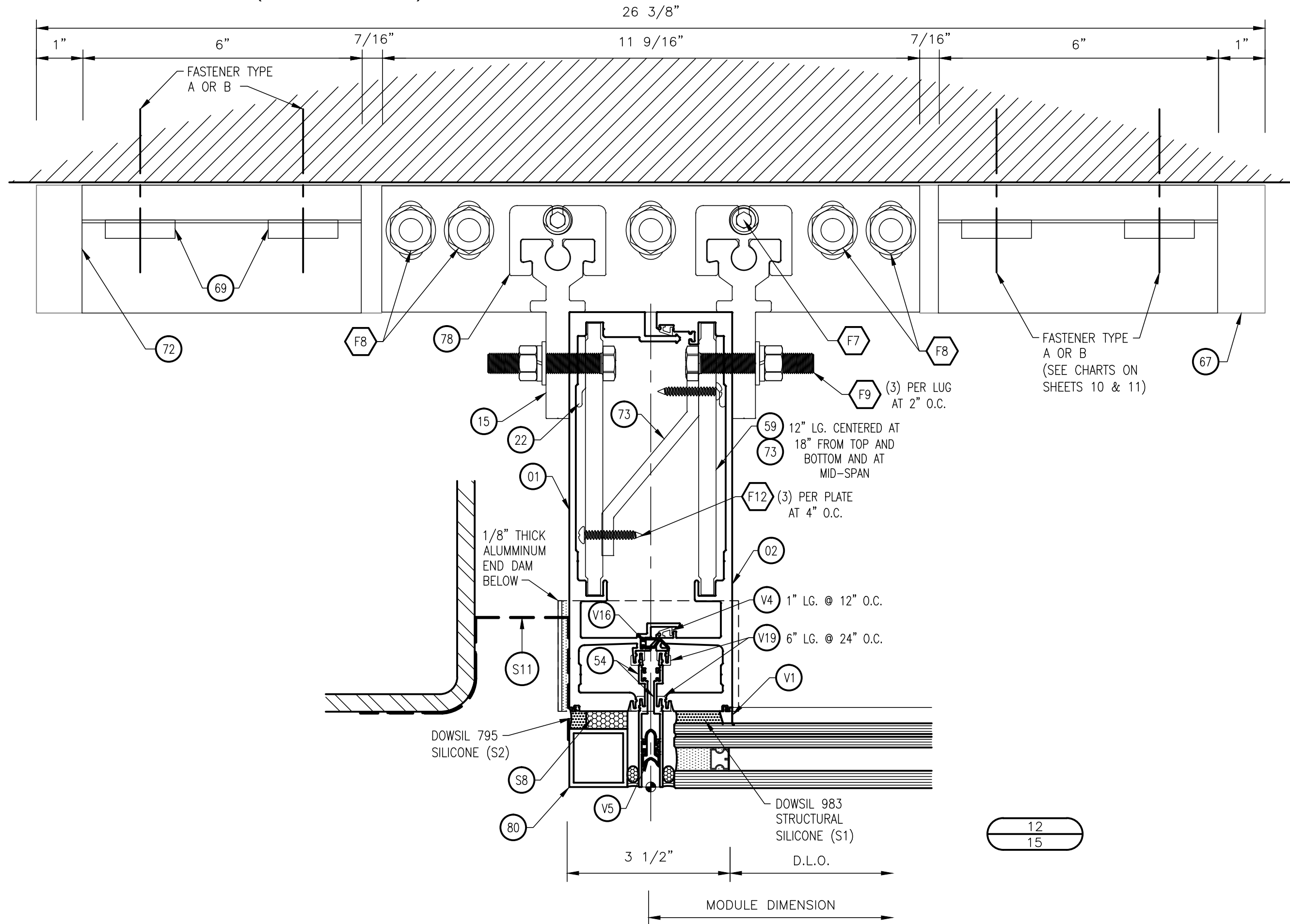


STD. MULLION AND ZIPPER MULLION DETAILS

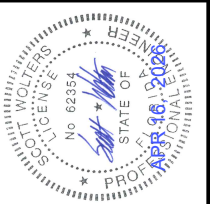


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REV #		
PRINTS ISSUED FOR		
1ST SUBMITTAL		
SCOTT WOLTERS		
FL PE# 62354		
WOLTERS ENGINEERING		
(CDA# 27194)		
15211 97TH ROAD N		
WEST PALM BEACH, FL 33412		
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CHICAGO, IL 60601		
DWG: MWS260BN-SM		
SHEET: 14/37		

JAMB ANCHOR DETAIL AT HEAD (SPANDREL AREA)



1	IST SUBMITTAL	REV #	DATE
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SEAL:

SCOTT WOLTERS
FL PE# 62354

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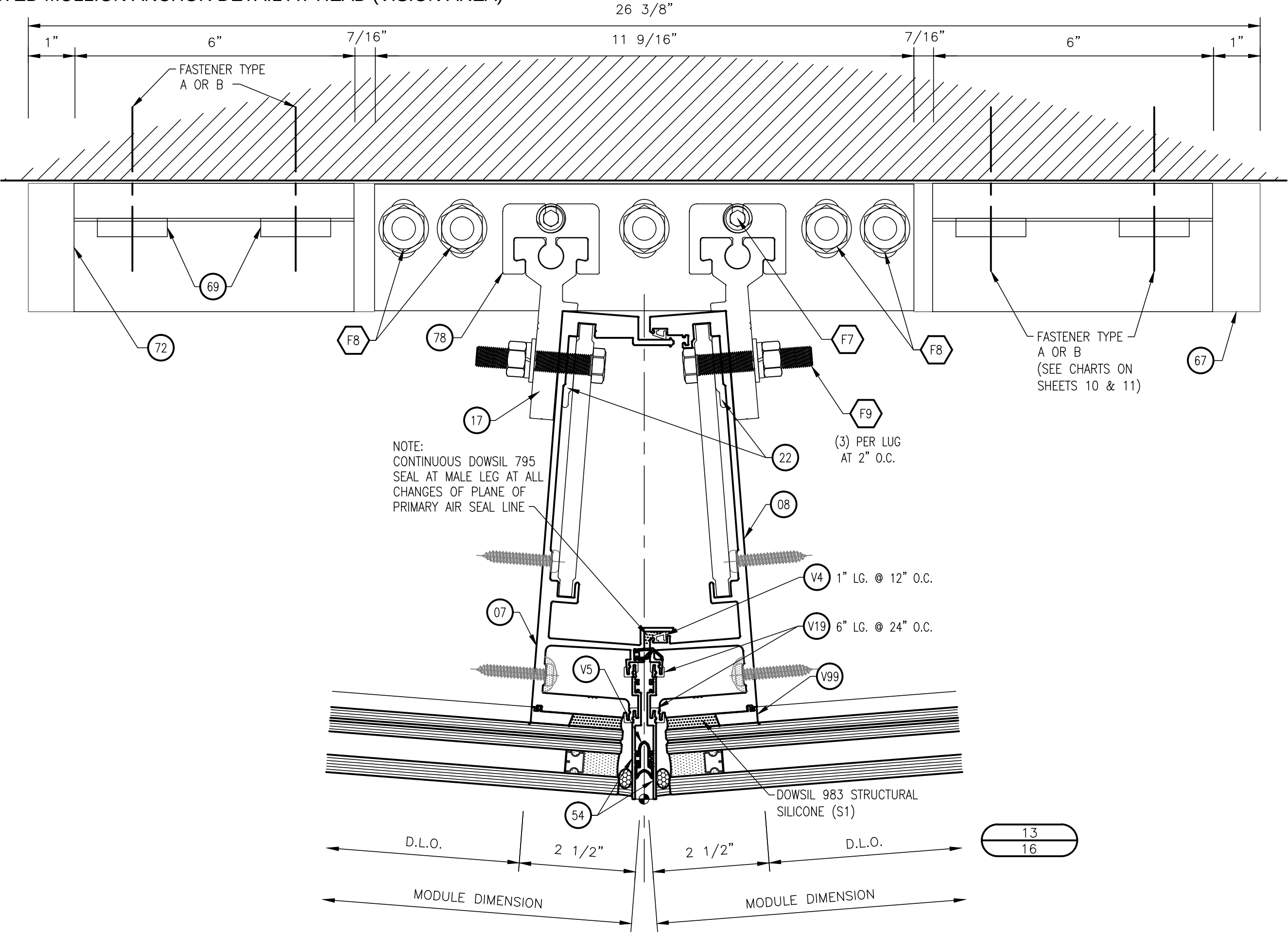
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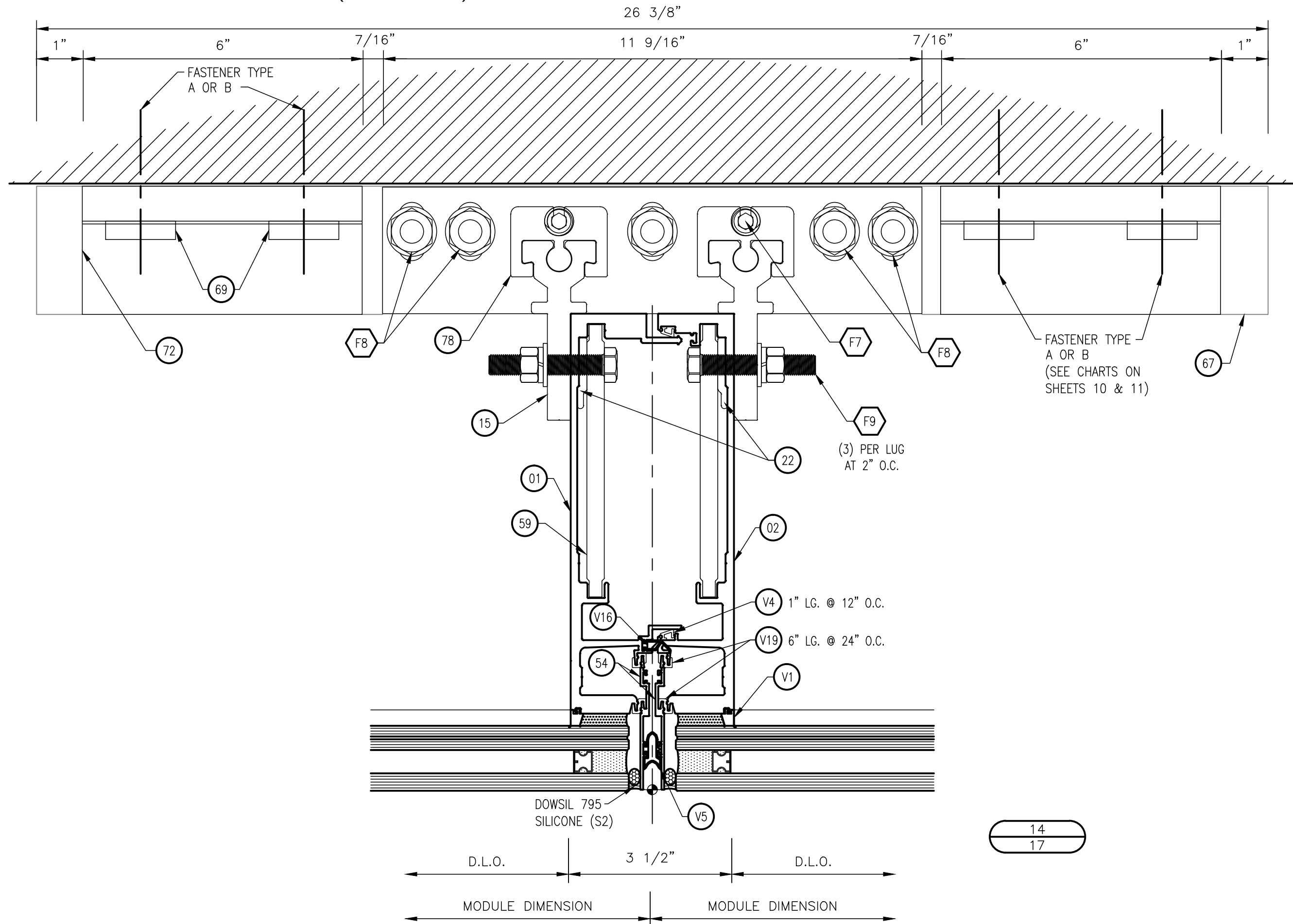
DWG:
MWS260BN-SM
SHEET: 15/37

SPLAYED MULLION ANCHOR DETAIL AT HEAD (VISION AREA)



2/26/26		DATE
1ST SUBMITTAL		REV #
PRINTS ISSUED FOR		
		
SEAL:		
SCOTT WOLTERS FL PE# 62354		
WOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982		
VENTANA DESIGN-BUILD SYSTEMS		
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DWG: MWS260BN-SM		
SHEET: 16/37		

STD. MULLION ANCHOR DETAIL AT HEAD (VISION AREA)



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17

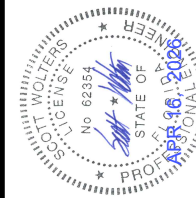
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PH: (312) 239-1570
www.ventana.vc

SCOTT WOLTERS
FL PE# 62354

WOLTERS ENGINEERING
(COA# 27194)
15211 97TH ROAD N
WEST PALM BEACH, FL 33412
(561) 225-1982

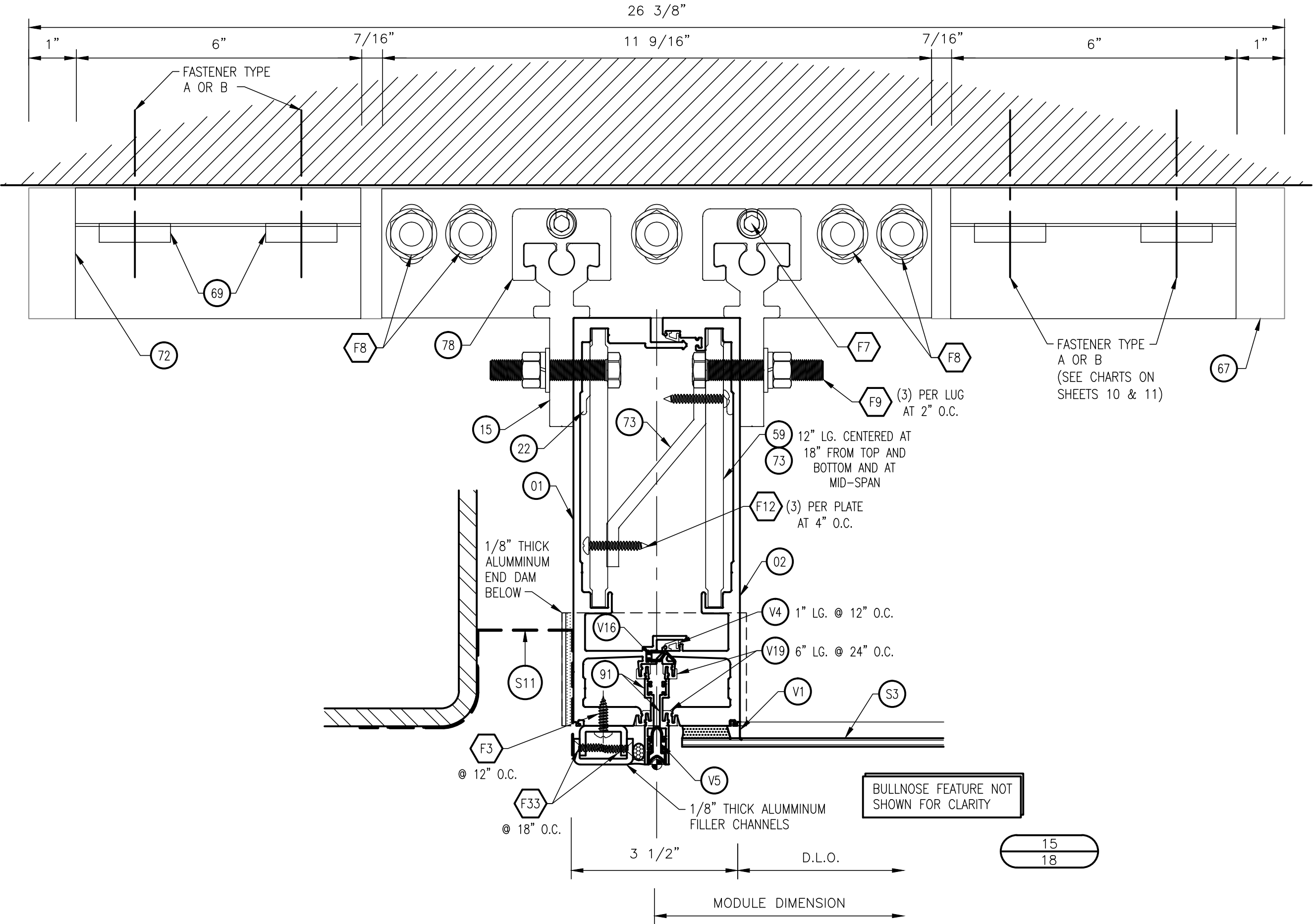


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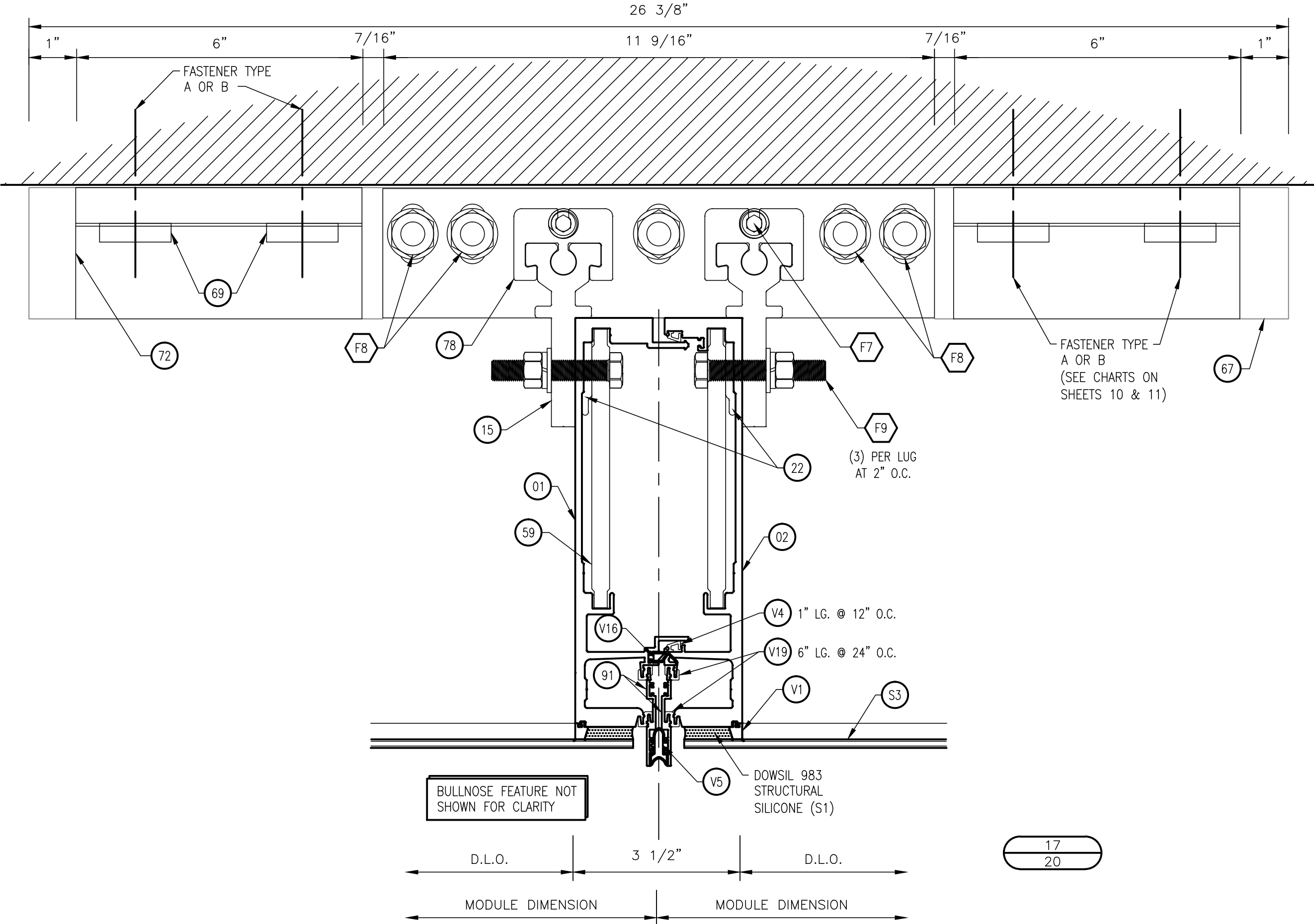
DATE 2/26/26

JAMB ANCHOR DETAIL AT HEAD (SPANDREL AREA)



2/26/26		DATE
1ST SUBMITTAL		REV #
PRINTS ISSUED FOR		
SCOTT WOLTERS FL PE# 62354 WOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982		
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DWG: MWS260BN-SM SHEET: 18/37		

STANDARD MULLION ANCHOR DETAIL AT HEAD (SPANDREL AREA)



2/26/26		DATE
1ST SUBMITTAL		REV #
PRINTS ISSUED FOR		

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FL PE# 62354

WOLTERS ENGINEERING
(CDA# 27194)
15211 97TH ROAD N
WEST PALM BEACH, FL 33412
(561) 225-1982

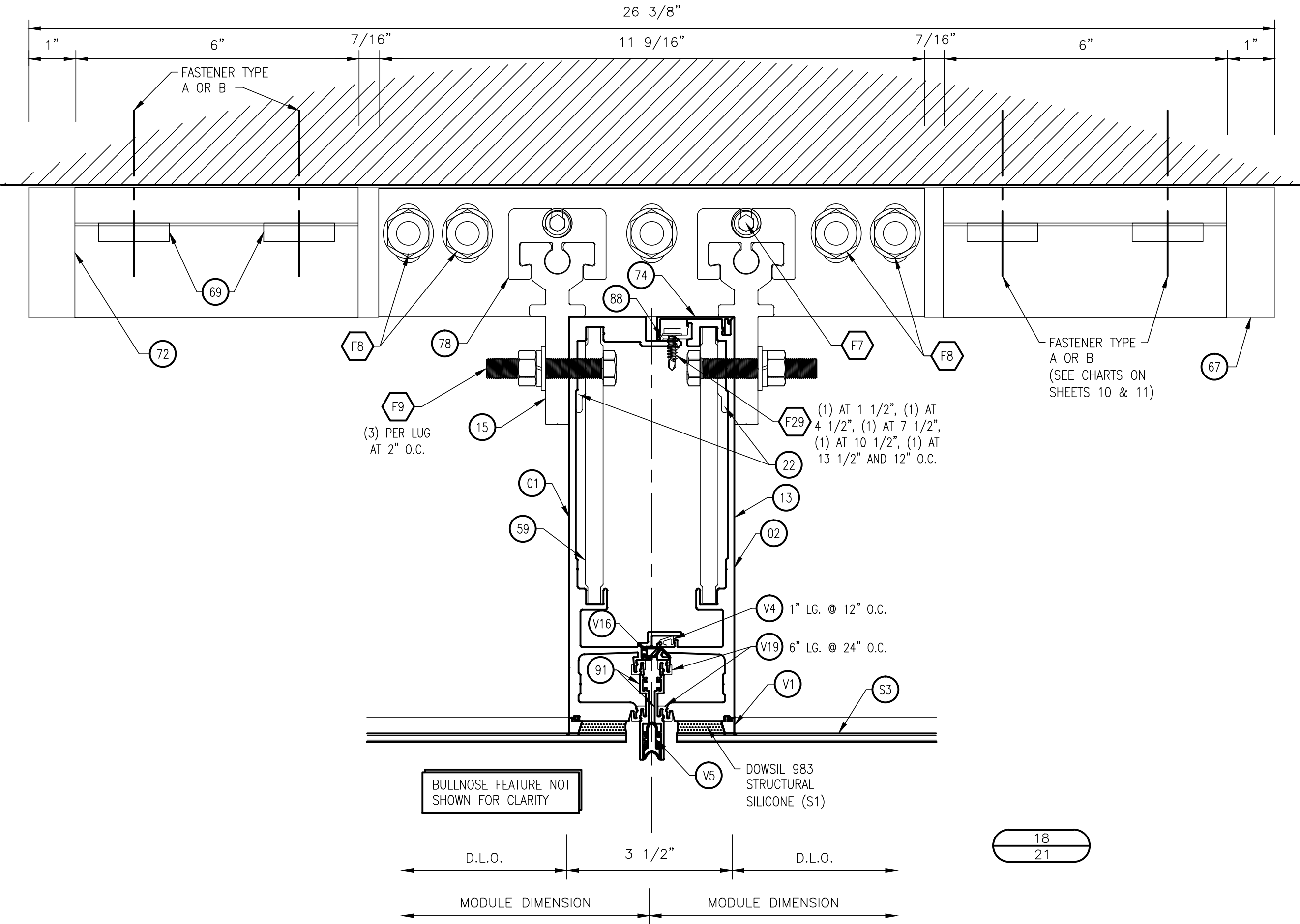
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35 EAST WACKER, SUITE 1400
CHICAGO, IL 60601
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DWG:
MWS260BN-SM

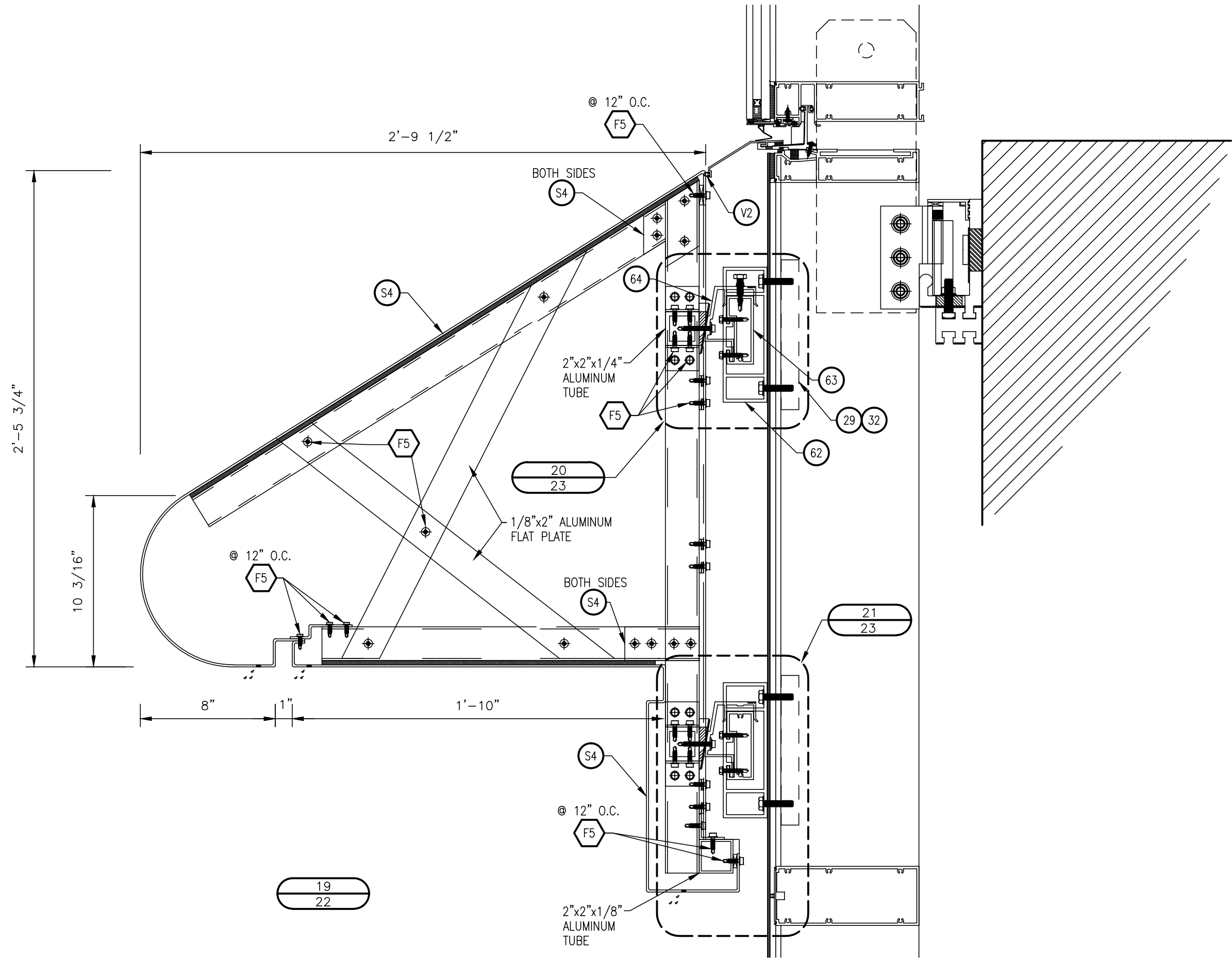
SHEET:
20/37

ZIPPER MULLION ANCHOR DETAIL AT HEAD (SPANDREL AREA)



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BULLNOSE FEATURE SECTION



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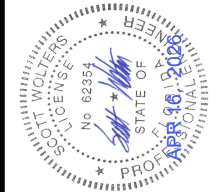
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DWG: MWS260BN-SM
SHEET: 22/37

SEAL:

SCOTT VOLTERS
FL PE# 62354

VOLTERS ENGINEERING
(CDA# 27194)
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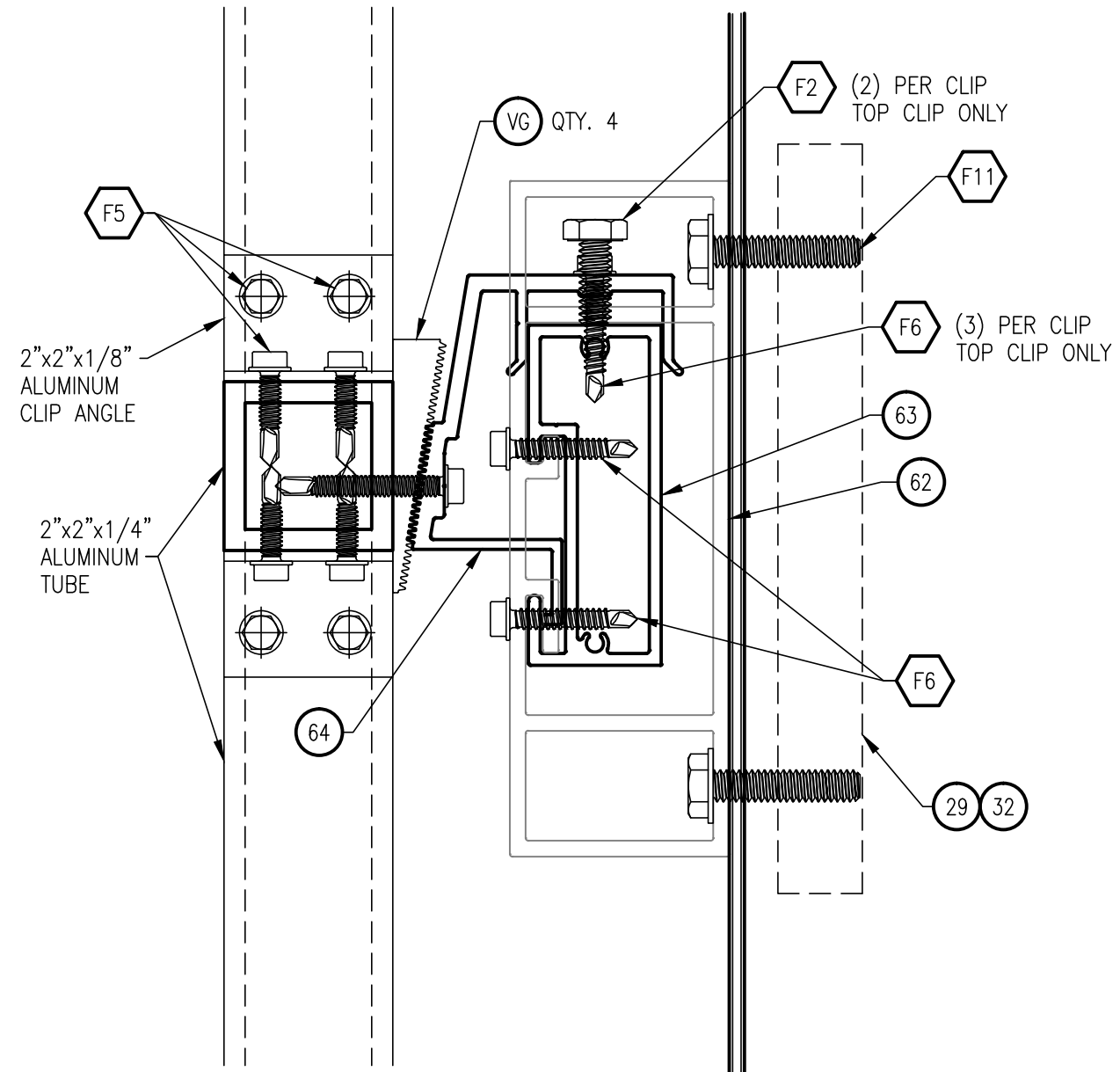
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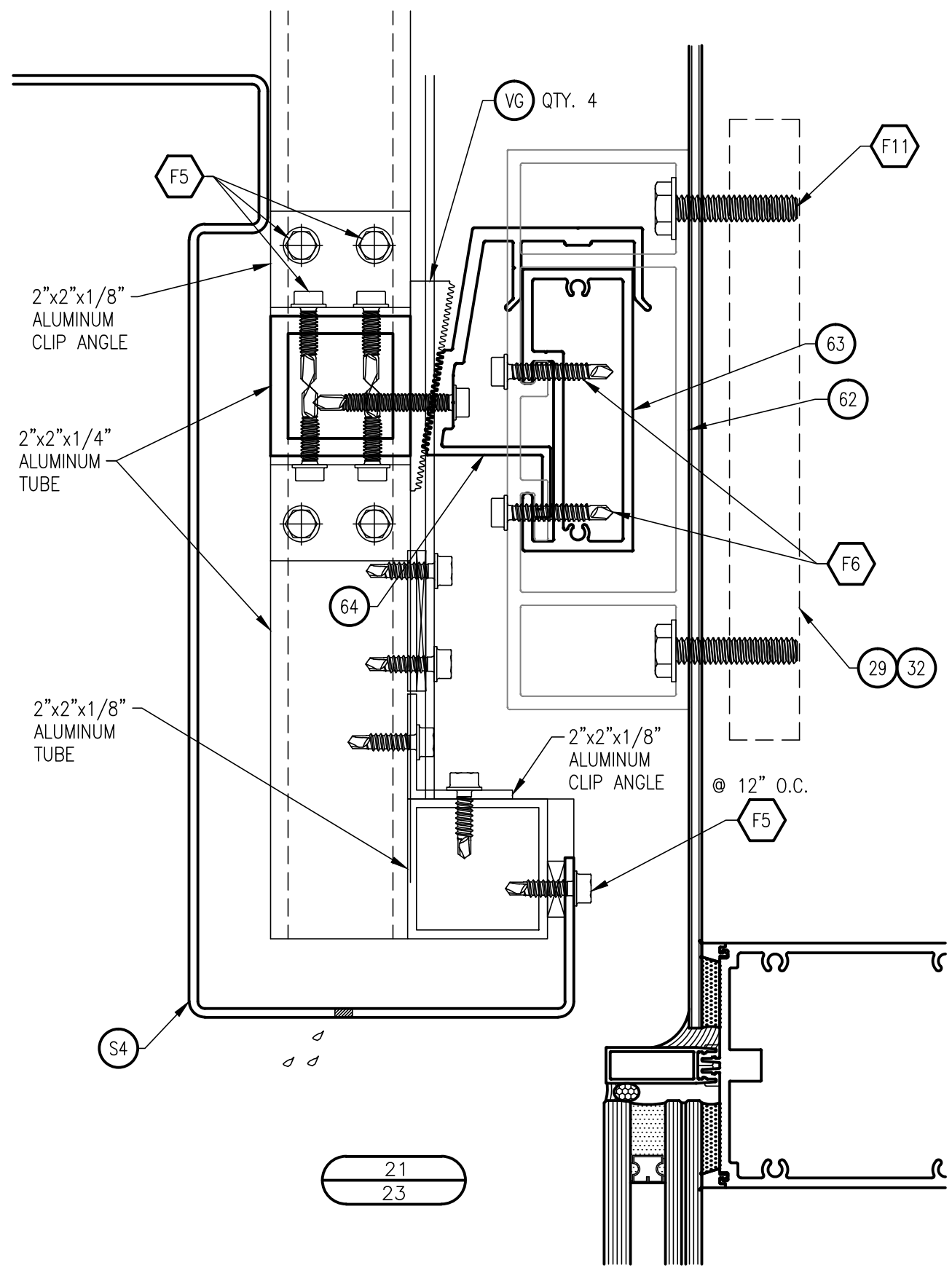
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DATE

BULLNOSE FEATURE DETAILS



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23



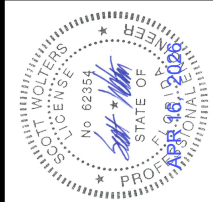
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VENTANA
DESIGN-BUILD SYSTEMS

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SEAL:
SCOTT VOLTERS
FL PE# 62354

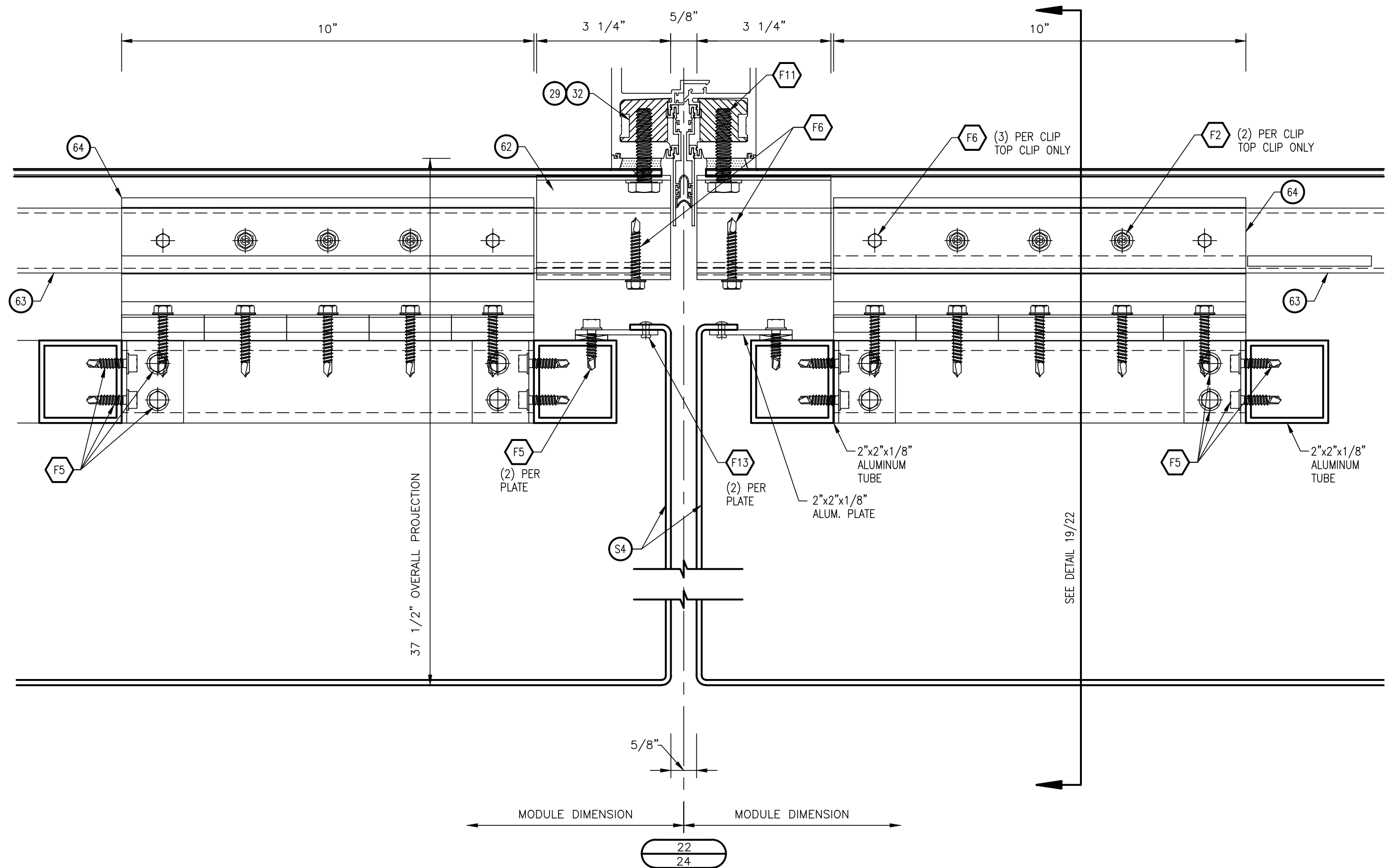
VOLTERS ENGINEERING
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BULLNOSE FEATURE DETAIL



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SEAL:

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DESIGN-BUILD SYSTEMS

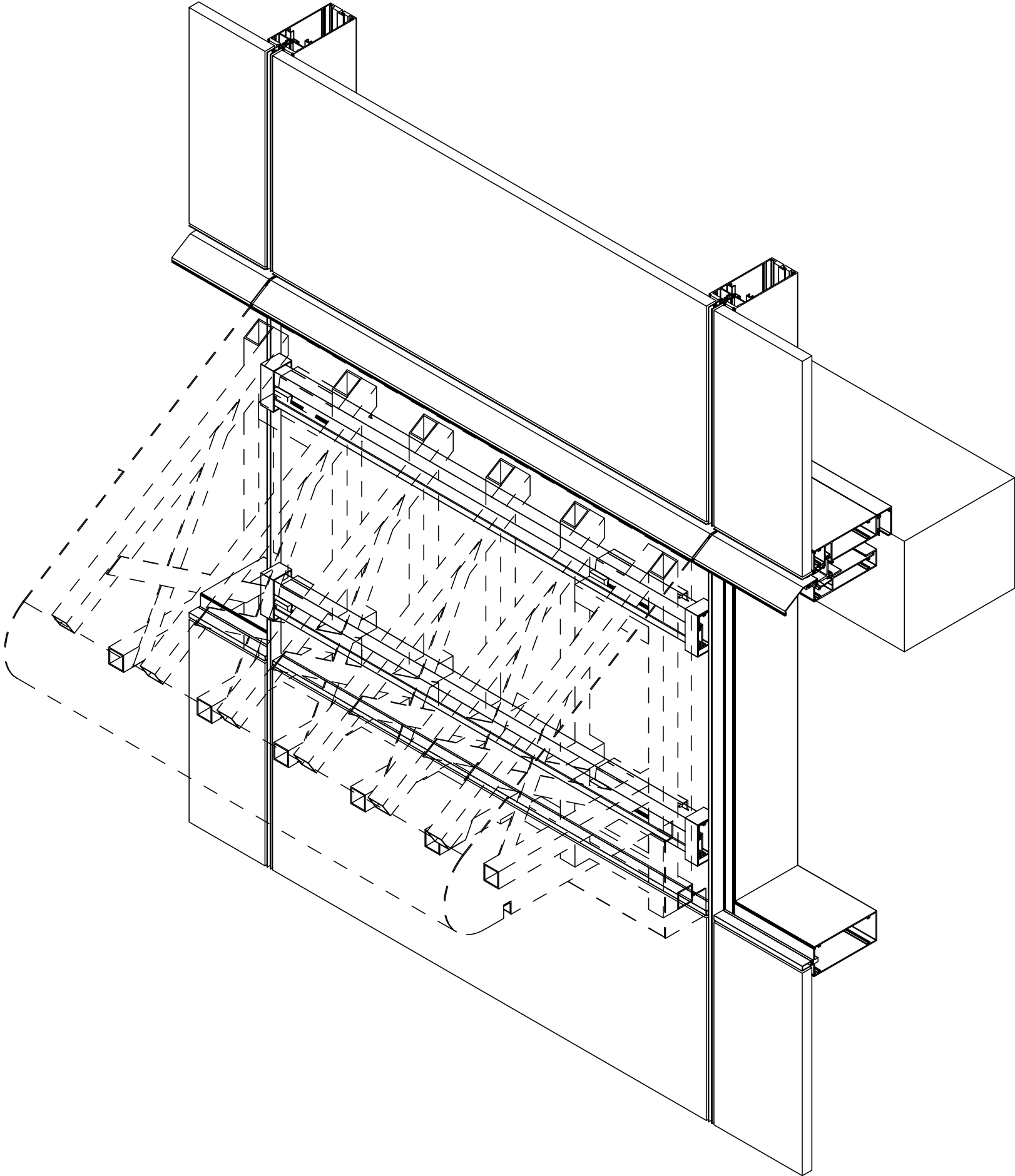
35 EAST WACKER, SUITE 1400
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DWG:
MWS260BN-SM

SHEET:
24/37

BULLNOSE FEATURE AXONOMETRIC PROJECTION



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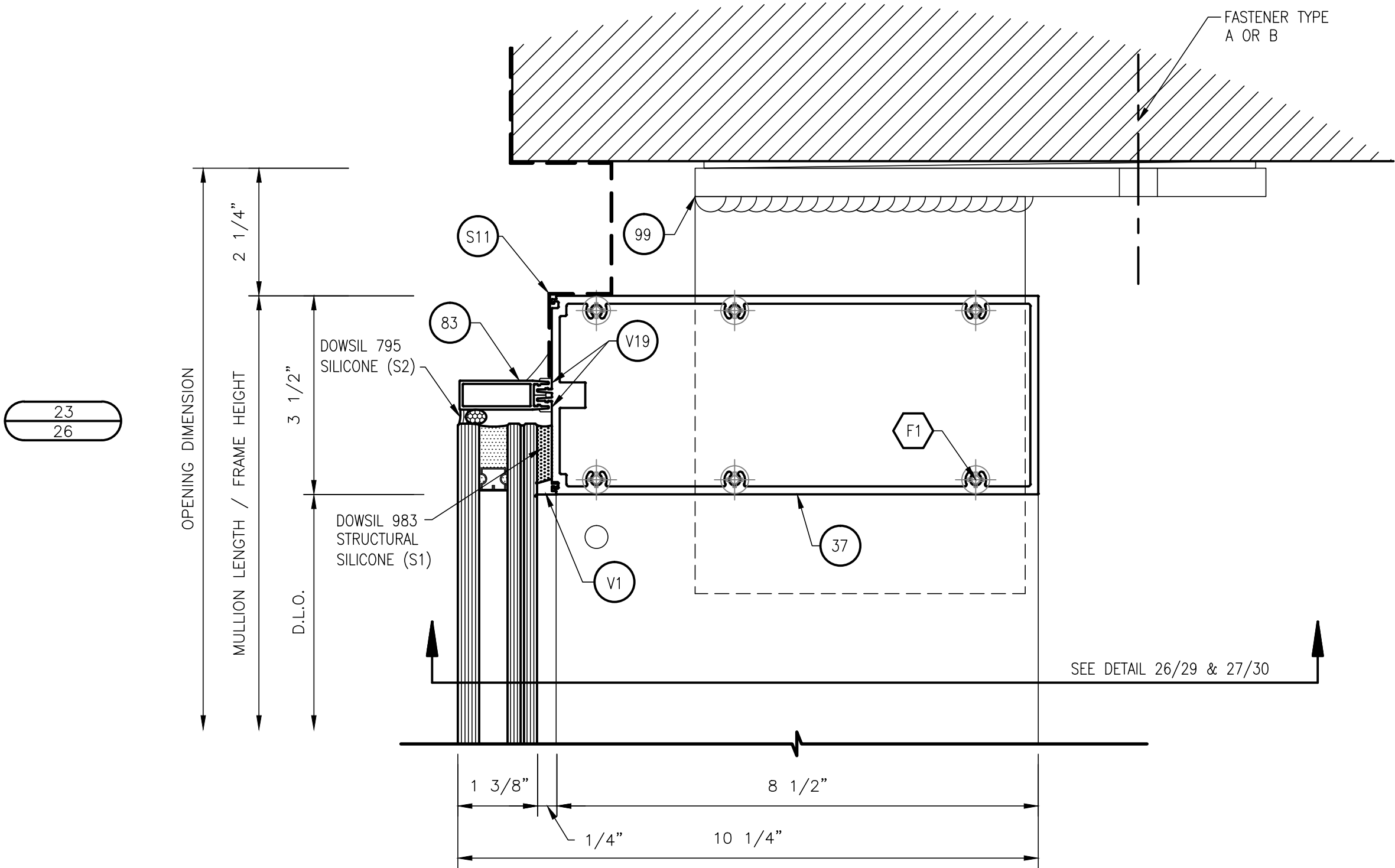
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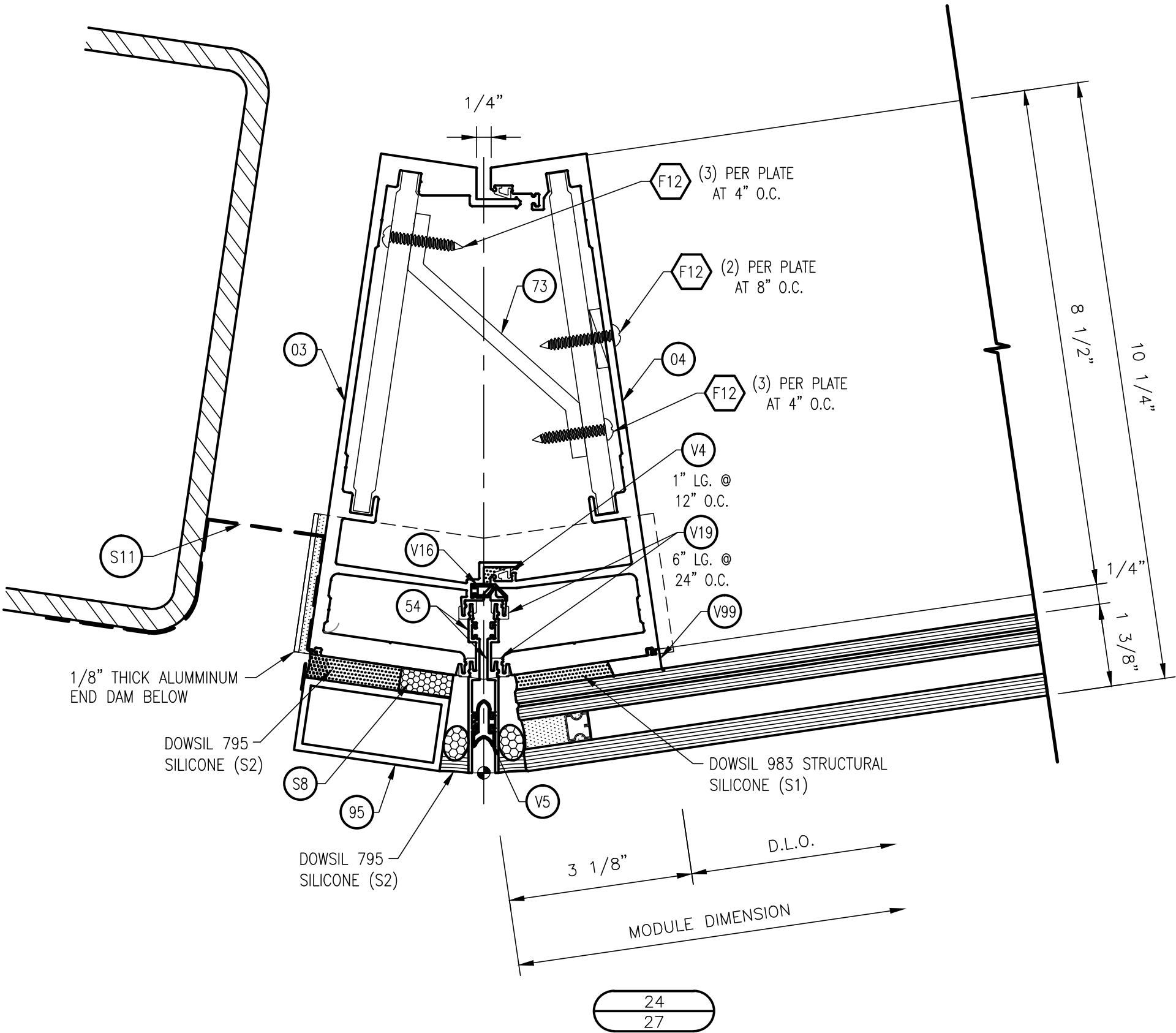
SHEET:
25/37

SINGLE SPAN HEAD DETAIL



DWG: MWS260BN-SM		SHEET: 26/37	
35 EAST WACKER, SUITE 1400 CHICAGO, IL 60601		PH: (312) 239-1570 www.ventana.vc	
VENTANA DESIGN-BUILD SYSTEMS		SCOTT VOLTERS FL PE# 62354 VOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982	
SEAL: 		PRINTS ISSUED FOR 1ST SUBMITTAL REV # 2/26/26 DATE	

SPLAYED MULLION AT JAMB DETAIL

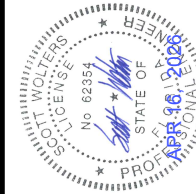


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DESIGN-BUILD SYSTEMS

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DWG:
MWS260BN-SM
SHEET: 27/37

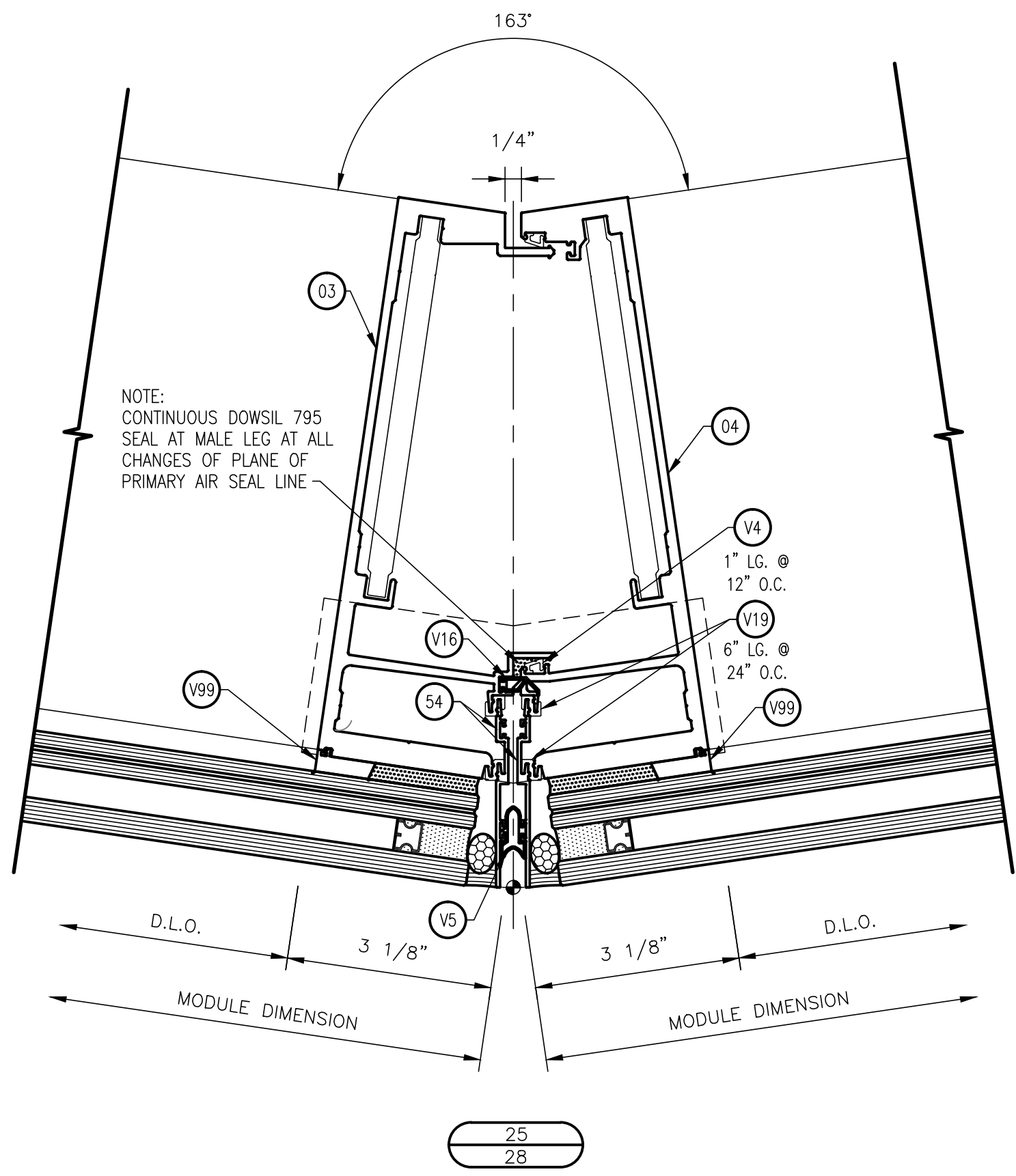
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FL PE# 62354
VOLTERS ENGINEERING
(CDA# 27194)
15211 97TH ROAD N
WEST PALM BEACH, FL 33412
(561) 225-1982



REV #	PRINTS ISSUED FOR
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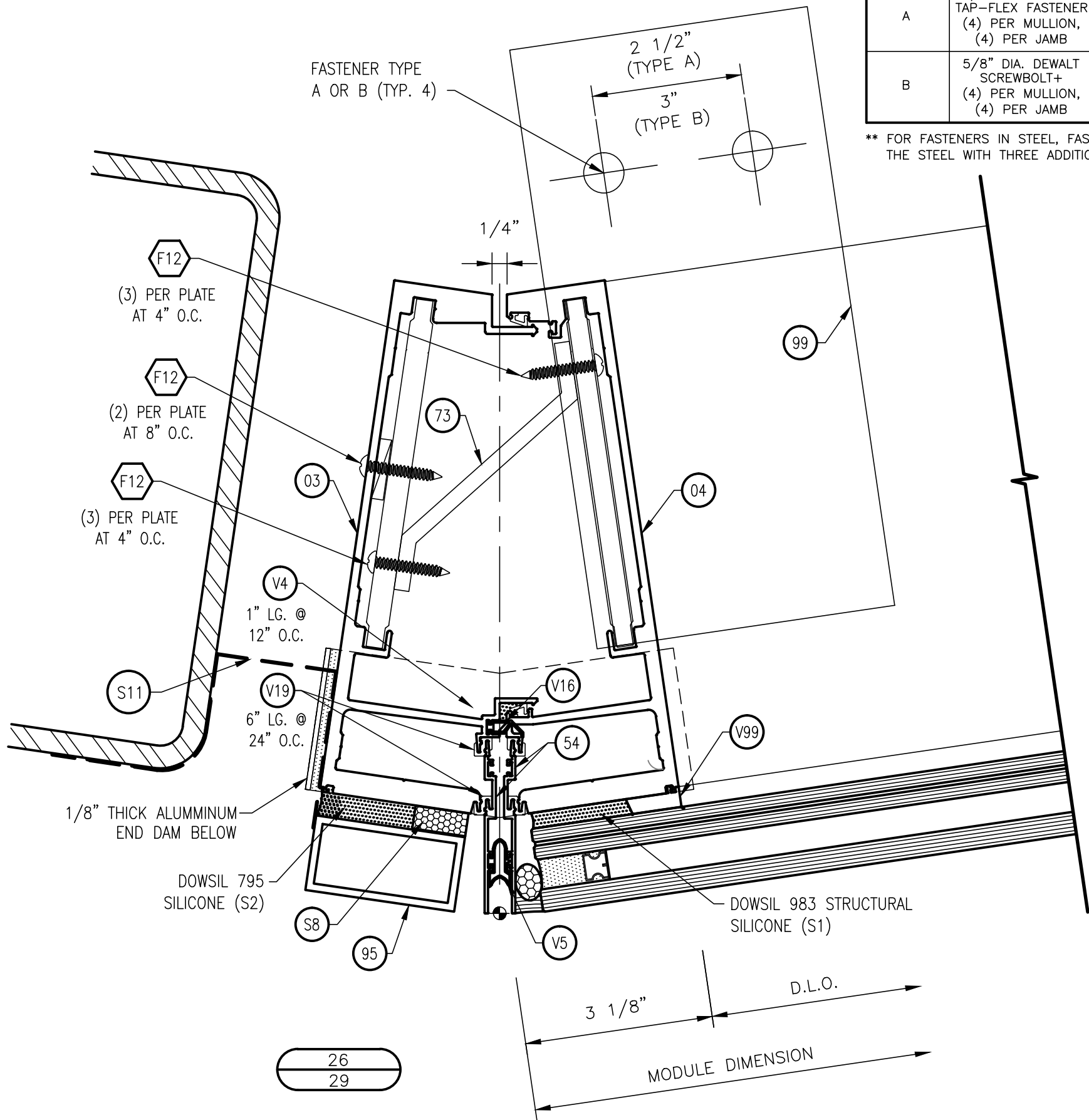
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SPLAYED MULLION DETAILS



DWG: MWS260BN-SM		SHEET: 28/37	
35 EAST WACKER, SUITE 1400 CHICAGO, IL 60601		PH: (312) 239-1570 www.ventana.vc	
VENTANA DESIGN-BUILD SYSTEMS		SCOTT VOLTERS FL PE# 62354 VOLTERS ENGINEERING (CDA# 27194) 15211 97TH ROAD N WEST PALM BEACH, FL 33412 (561) 225-1982	
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		DATE	

SPLAYED MULLION DETAILS



ANCHOR SCHEDULE (HEAD ANCHORS)							
FASTENER TYPE	DESCRIPTION	BASE MATERIAL	EMBEDMENT	EDGE DISTANCE	SPACING (MIN.)	MAXIMUM MULLION END REACTION (LB)	MAXIMUM JAMB END REACTION (LB)
A	5/8" DIA. DEWALT TAP-FLEX FASTENER (4) PER MULLION, (4) PER JAMB	STEEL (1/4" MIN., 36 KSI MIN.)	FULL**	1 1/2"	3"	3100	1670
B	5/8" DIA. DEWALT SCREWBOLT+ (4) PER MULLION, (4) PER JAMB	CONCRETE (4000 PSI)	4"	4 1/2"	4"	3100	1670

** FOR FASTENERS IN STEEL, FASTENER THREADS MUST FULLY PENETRATE THE WALL THICKNESS OF THE STEEL WITH THREE ADDITIONAL THREADS BEYOND

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DATE

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WOLTERS ENGINEERING
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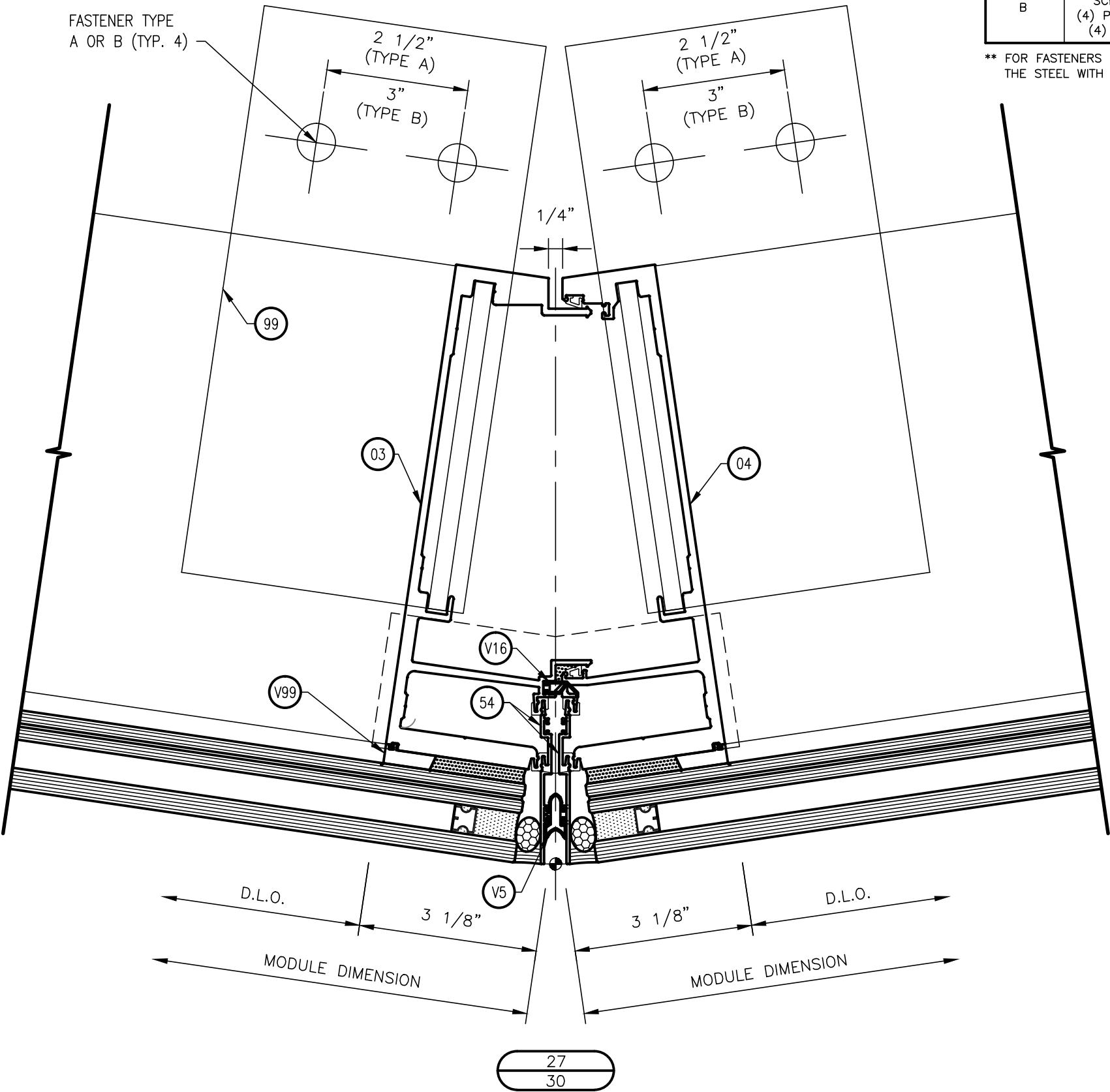
DWG:

MWS260BN-SM

SHEET:

29/37

SPLAYED MULLION AT JAMB HEAD ANCHOR DETAIL



ANCHOR SCHEDULE (HEAD ANCHORS)							
FASTENER TYPE	DESCRIPTION	BASE MATERIAL	EMBEDMENT	EDGE DISTANCE	SPACING (MIN.)	MAXIMUM MULLION END REACTION (LB)	MAXIMUM JAMB END REACTION (LB)
A	5/8" DIA. DEWALT TAP-FLEX FASTENER (4) PER MULLION, (4) PER JAMB	STEEL (1/4" MIN., 36 KSI MIN.)	FULL**	1 1/2"	3"	3100	1670
B	5/8" DIA. DEWALT SCREWBOLT+ (4) PER MULLION, (4) PER JAMB	CONCRETE (4000 PSI)	4"	4 1/2"	4"	3100	1670

** FOR FASTENERS IN STEEL, FASTENER THREADS MUST FULLY PENETRATE THE WALL THICKNESS OF THE STEEL WITH THREE ADDITIONAL THREADS BEYOND

2/26/26

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FL PE# 62354
VOLTERS ENGINEERING
(CDA# 27194)
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30/37

BILL OF MATERIALS				
NO.	PART NO.	DESCRIPTION	DIMENSIONS	MATERIAL
01	16002-01	MALE MULLION HALF	2.372" x 8.578" x 0.140"	6063 T6 ALUMINUM
02	16002-02	FEMALE MULLION HALF	1.747" x 8.577" x 0.140"	6063 T6 ALUMINUM
03	16002-03	MALE MULLION HALF	3.357" x 8.589" x 0.140"	6063 T6 ALUMINUM
04	16002-04	FEMALE MULLION HALF	2.815" x 8.590" x 0.140"	6063 T6 ALUMINUM
05	16002-05	MALE MULLION HALF	2.975" x 8.587" x 0.140"	6063 T6 ALUMINUM
06				
07	16002-07	MALE MULLION HALF	2.892" x 8.587" x 0.140"	6063 T6 ALUMINUM
08	16002-08	FEMALE MULLION HALF	2.317" x 8.590" x 0.140"	6063 T6 ALUMINUM
09				
10				
11	16002-11	MALE MULLION HALF	2.556" x 8.587" x 0.140"	6063 T6 ALUMINUM
12	16002-12	FEMALE MULLION HALF	1.946" x 8.590" x 0.140"	6063 T6 ALUMINUM
13	16002-13	ZIPPER MULLION	1.747" x 8.517" x 0.140"	6063 T6 ALUMINUM
14				
15	16002-15	MULLION ANCHOR LUG	1.575" x 3.846" x .500"	6061 T6 ALUMINUM
16				
17	16002-17	MULLION ANCHOR LUG	1.575" x 3.900" x .500"	6061 T6 ALUMINUM
18	16002-18	MULLION ANCHOR LUG	1.575" x 3.900" x .500"	6061 T6 ALUMINUM
19				
20	16002-20	MULLION ANCHOR LUG	1.575" x 3.910" x .500"	6061 T6 ALUMINUM
21				
22	16002-22	MULLION BACKER PLATE	0.167" x 1.525"	6061 T6 ALUMINUM
23				
24				
25				
26				
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28				
29	16002-29	FIN ANCHOR LUG	1.22" x 1.034"	6005A T61 ALUMINUM
30				
31	16002-31	FIN ANCHOR LUG	.XXX" x XXX"	6005A T61 ALUMINUM
32	16002-32	FIN ANCHOR LUG	1.803" x 1.036"	6005A T61 ALUMINUM
33				
34				
35				
36	16002-36	STACK HEAD	8.565" x 1.968" x 0.14"	6063 T6 ALUMINUM
37	16002-37	HORIZONTAL	8.836" x 3.500" x 0.14"	6063 T6 ALUMINUM
38	16002-38	STACK SILL	8.842" x 2.638" x 0.14"	6063 T6 ALUMINUM
39	16002-39	STACK SILL	8.842" x 2.638" x 0.14"	6063 T6 ALUMINUM
40				
41				
42	16002-42	STARTER SILL	6.579" x 3.738" x 0.51"	6063 T6 ALUMINUM
43				
44	16002-44	STARTER SILL TRIM	4.250" x 4.849" x 0.125"	6063 T6 ALUMINUM
45	16002-45	CHICKEN HEAD	3.475" x 2.598" x 0.148"	6063 T6 ALUMINUM
46				
47				
48				

BILL OF MATERIALS				
NO.	PART NO.	DESCRIPTION	DIMENSIONS	MATERIAL
49	16002-49	HORIZONTAL GLAZING TRIM	0.512" x 1.568" x 0.059"	6063 T5 ALUMINUM
50				
51	16002-51	HEAD TRIM	4.433" x 2.178" x 0.084"	6063 T6 ALUMINUM
52				
53				
54	16002-54	MULLION GLAZING ADAPTOR	2.872" x 0.187" x 0.059"	6063 T5 ALUMINUM
55				
56	16002-56	SETTING BLOCK CHAIR (MONO)	1.804" x 0.354" x 0.118"	6061 T6 ALUMINUM
57	16002-57	SETTING BLOCK CHAIR (INS.)	2.508" x 0.354" x 0.118"	6061 T6 ALUMINUM
58	16002-58	SETTING BLOCK CHAIR	1.463" x 0.565" x 0.059"	6061 T6 ALUMINUM
59	16002-59	MULLION LIFTING LUG	5.837" x 0.375"	6061 T6 ALUMINUM
60				
61				
62	16002-62	UHPC 4" RAIL	2.598" x 8.00" x 0.1875"	6061 T6 ALUMINUM
63	16002-63	UHPC SPACER BLOCK	1.575" x 4.029" x 0.14"	6061 T6 ALUMINUM
64	16002-64	UHPC CLIP	3.144" x 4.139" x 0.19"	6061 T6 ALUMINUM
65				
66	16002-66	ANCHOR SLED	2.697" x 1.943" x 0.700"	6061 T6 ALUMINUM
67	16002-67	ANCHOR BRIDGE 1	2.749" x 2.249" x 0.750"	6061 T6 ALUMINUM
68	16002-68	ANCHOR BRIDGE 2	3.977" x 2.249" x 0.750"	6061 T6 ALUMINUM
69	16002-69	NUTBAR	1.732" x 0.393"	6061 T6 ALUMINUM
70				
71	16002-71	LIFTUP CLIP	2.850" x 1.224" x 0.218"	6061 T6 ALUMINUM
72	16002-72	BASE ANCHOR CLIP	7.052" x 2.750" x 0.75"	6061 T6 ALUMINUM
73	16002-73	"Z" PLATE	3.916" x 2.078" x 0.25"	6061 T6 ALUMINUM
74	16002-74	ZIPPER MULLION INT. TRIM	1.610" x 0.500" x 0.059"	6063 T5 ALUMINUM
75				
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78	16002-78	ANCHOR SLIDE	2.068" x 1.503" x .719"	6063 T5 ALUMINUM
79				
80	16002-80	ALUMINUM TUBE	1.250" x 1.250" x 0.093"	6063 T5 ALUMINUM
81				
82				
83	16002-83	HORIZONTAL GLAZING TRIM	0.512" x 0.75" x 0.059"	6063 T5 ALUMINUM
84				
85				
86				
87	16002-87	SETTING BLOCK CHAIR	0.711" x 0.565" x 0.059"	6061 T6 ALUMINUM
88	16002-88	CLIP	0.774" x 0.372" x 0.062"	6063 T5 ALUMINUM
89				
90				
91	16002-91	MULLION GLAZING ADAPTOR	2.055" x 0.187" x 0.059"	6063 T5 ALUMINUM
92				
93				
94				
95	16002-95	ALUMINUM TUBE	2.500" x 1.250" x 0.125"	6063 T5 ALUMINUM

SEAL:

SCOTT WOLTERS
FL PE# 62354

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(COA# 27194)
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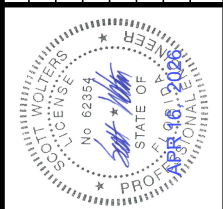


DWG:
MWS260BN-SM
SHEET: 31/37

GLAZING MATERIALS			
NO.	DETAIL	DESCRIPTION	NOTES
V1		V8000-E STRUCTURAL SILICONE SPACER USED AT MULLION AND HORIZONTALS MATERIAL: SILICONE 85 +/-5 DUROMETER	
V2		V8002 CONTINUOUS PRIMARY AIRSEAL GASKET USED AT STACK JOINT MATERIAL: EPDM 70 +/-5 DUROMETER	
V4		V8004 PVC SPACER USED AT MULLION AND STACK MATERIAL: PVC	1" LONG @ 12" OC
V5		V8005 CONTINUOUS RAINSCREEN GASKET GASKET USED AT MULLION AS EXTRUDED MATERIAL: EPDM 70 +/-5 DUROMETER	
V7		V8007 CONTINUOUS RAINSCREEN GASKET USED AT STACK JOINT MATERIAL: EPDM 70 +/-5 DUROMETER	
V9		V8009 THERMAL SPACER USED AT CHICKEN HEAD MATERIAL: PVC	6" LONG @ 24" O.C.
V11		V8011 BEARING PAD MATERIAL: PVC	4" LONG @ 1/4 POINTS
V16		V8016 CONTINUOUS PRIMARY AIRSEAL GASKET USED AT MULLION MATERIAL: EPDM 70 +/-5 DUROMETER	
V19		V8019 Z-CLIPS USED AT MULLION MATERIAL: PVC	1" LONG @ 18" OC HORIZONTALS 6" LONG @ 24" OC VERTICALS
V99		V8099-G STRUCTURAL SILICONE GASKET USED AT SPLAY MULLIONS MATERIAL: SILICONE 80 +/-5 DUROMETER	
VG		V8100-G WEDGE SHIM MATERIAL: ABS	
SB1		SB-01 5/32" X 1 1/4" SETTING BLOCK FOR INSULATED GLASS MATERIAL: SILICONE 85 +/-5 DUROMETER	9" LONG @ 1/4 POINTS FBC 2411.3.3.1 COMPLIANT
SB2		SB-02 5/32" X 3/8" SETTING BLOCK FOR LAMINATED GLASS MATERIAL: SILICONE 85 +/-5 DUROMETER	9" LONG @ 1/4 POINTS FBC 2411.3.3.1 COMPLIANT
SB3		SB-03 4" X 1" , 3 7/8" LONG SHIM USED AT STARTER SILL MATERIAL: PVC	FBC 2411.3.3.1 COMPLIANT

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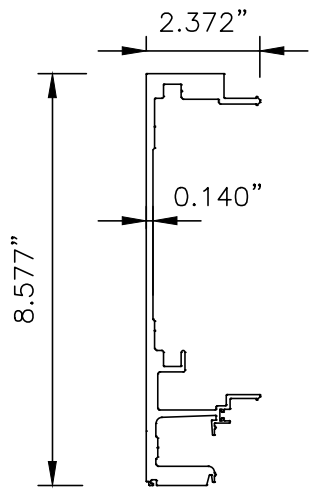
DWG:
MWS260BN-SM
SHEET: 32 / 37

FASTENER SCHEDULE			
NO.	DETAIL	DESCRIPTION	NOTES
F1		1/4"-20 x 1 1/2", PH, TYPE F, 304 S.S. (FU=100 KSI MIN)	
		ALT. - 1/4" X 1 1/2", PH, SMS, AB, 304 S.S. (FU=100 KSI MIN)	
F2		3/8" x 1"H.H. MACHINE BOLT STAINLESS JACKING BOLT	
F3		#10 X 3/4", PH, SMS, AB, 304 S.S. (FU=100 KSI MIN)	
F4		5/32" x 0.7 HH MACHINE BOLT FULL THREAD	
F5		1/4"-20 x 1 1/8", HWH, DRILL-FLEX (EAF865) (FU=100 KSI MIN)	
F6		1/4"-14 x 1 1/2", HWH, DRILL-FLEX (EAF841) (FU=100 KSI MIN)	
F7		5/8"-11 x 5/8" 18-8 SET SCREW	
F8		1/2" -13 x 2" SQUARE HEAD BOLT GRADE 5 WITH 2 FLAT WASHERS AND 1 LOCK WASHER OR NYLOCK NUT	
F9		1/2" -20 x 2 1/2" H.H. MACHINE BOLT 304 S.S.WITH 2 FLAT WASHERS AND 1 LOCK WASHER OR NYLOCK NUT (FU=100 KSI MIN)	
F10		5/8"-11 x 2 1/2", TAPFLEX BOLT, GRADE 5 (ESU530),STALGARD	
F11		3/8"-16 x 1 3/4" H.H. MACHINE BOLT, STAINLESS JACKING BOLT	
F12		#10 x 1 1/4", PH, SMS, AB, 304 S.S. (FU=100 KSI MIN)	
F13		2.5mm x 10mm, DOMED HEAD BLIND RIVET 304 S.S. (FU=100 KSI MIN)	
F14		JB M16 x 60mm HDG 8.8 T-BOLT FOR JORDAHLÉ ANCHOR CHANNELS JTA W50/30	
F15		1/4"-20 x 2", HWH, DRILL-FLEX. (EAF886) (FU=100 KSI MIN)	
F16		1/2" -20 x 2 1/2" H.H. MACHINE BOLT, 304 S.S.WITH 2 FLAT WASHERS AND 1 LOCK WASHER OR NYLOCK NUT (FU=100 KSI MIN)	

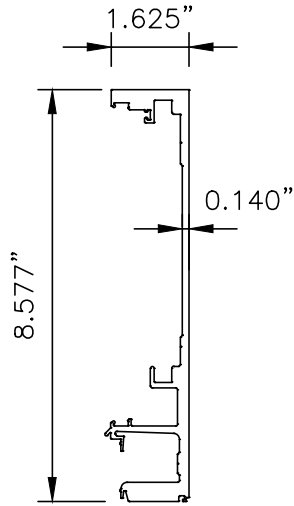
FASTENER SCHEDULE			
NO.	DETAIL	DESCRIPTION	NOTES
F17		1/4"-20 x 2 1/2", HWH, DRILL-FLEX. (EAF890)	
F18		1/4" x 3", HWH, TAPCON	
F19		1/4" x 3 1/4", FH,TAPCON	
F20		#10 x 7/8", PH, SMS, AB, 304 S.S. (FU=100 KSI MIN)	
F21		1/4"-20 x 3 3/8", HWH, DRILL-FLEX (EAF900) (FU=100 KSI MIN)	
F22		5/32" x 1/2" PHILLIPS FH SCREW, AB, 304 S.S./A2-70. (FU=100 KSI MIN)	
F23		1/4"-14 x 2", HWH, DRILL-FLEX (EAF846) (FU=100 KSI MIN)	
F24		1/2"-13 x 2", TAPFLEX BOLT, GRADE 5 (ESU420), STALGARD	
F25		STEEL WASHER FOR 5/8" BOLT	
F26			
F27		#10-16 x 3/4" H.W.H. AB, S.S (FU=100 KSI MIN)	
F28		#12-11 x 5/8"PHILLIPS FH SCREW, AB, 304 S.S./A2-70. (FU=100 KSI MIN)	
F29		3/16"-16 x 3/4", HWH, DRILL-FLEX (EAF430) (FU=100 KSI MIN)	
F30		5/8"-11 x 1 1/2", TAPFLEX BOLT, GRADE 5 (ESU510), STALGARD	
F31		5/8" x 3" H.H. MACHINE BOLT, FULL THREAD 304 S.S.,WITH 2 FLAT WASHERS AND 1 LOCK WASHER OR NYLOCK NUT	
F32			
F33		#8 x 3/4", FH, SMS, AB, STALGARD (FU=100 KSI MIN)	

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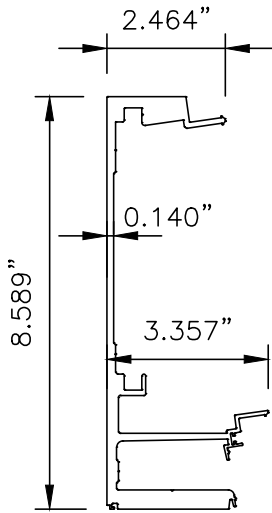
EXTRUSION PROFILES



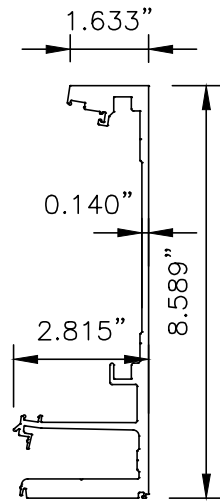
01 MALE MULLION



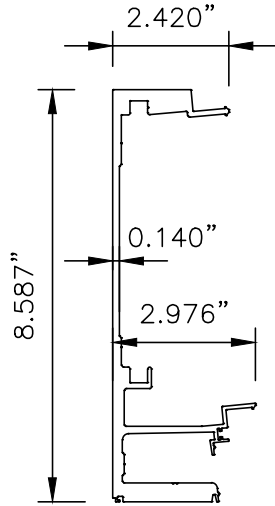
02 FEMALE MULLION



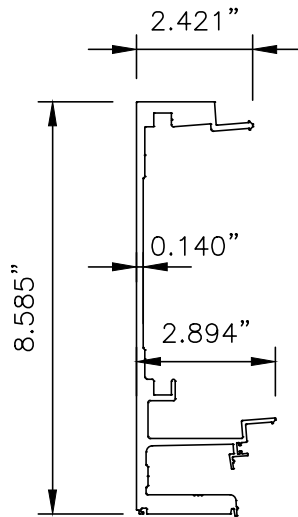
03 MALE MULLION



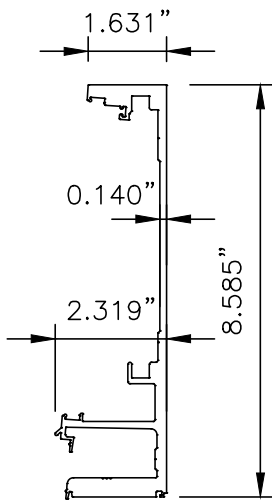
04 FEMALE MULLION



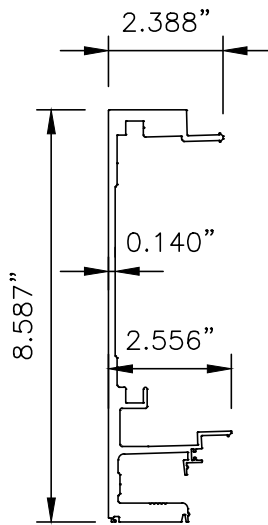
05 MALE MULLION



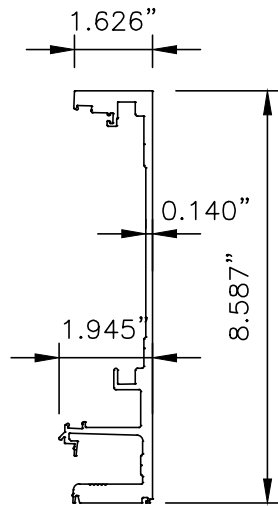
07 MALE MULLION



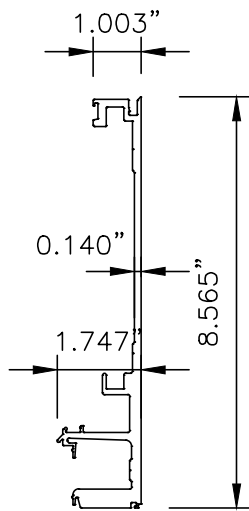
08 FEMALE MULLION



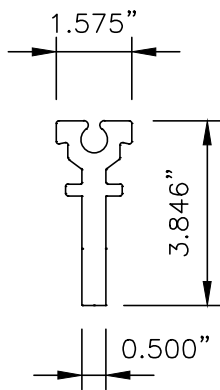
11 MALE MULLION



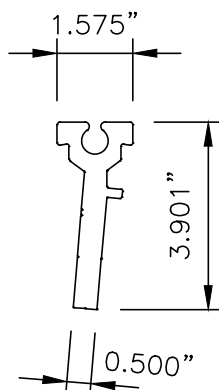
12 FEMALE MULLION



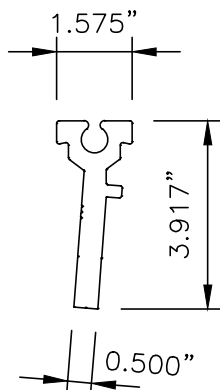
13 ZIPPER MULLION



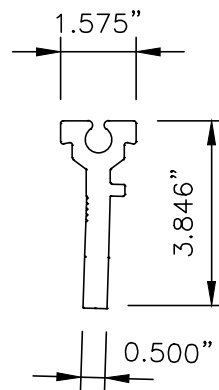
15 MULLION ANCHOR LUG



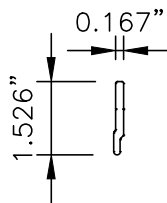
17 MULLION ANCHOR LUG



18 MULLION ANCHOR LUG



20 MULLION ANCHOR LUG



22 MULLION BACKER PLATE

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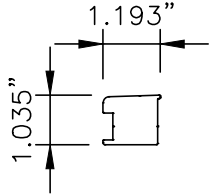


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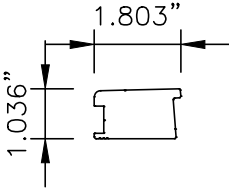
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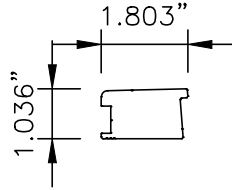
EXTRUSION PROFILES



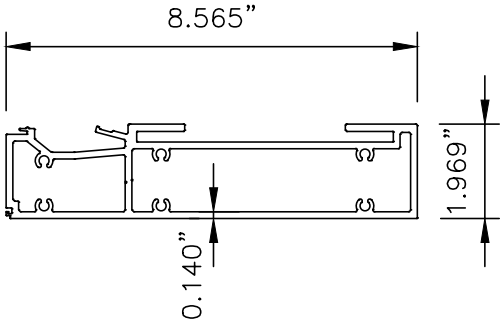
29 FIN ANCHOR LUG



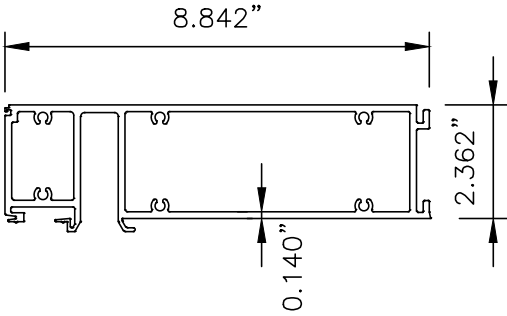
31 FIN ANCHOR LUG



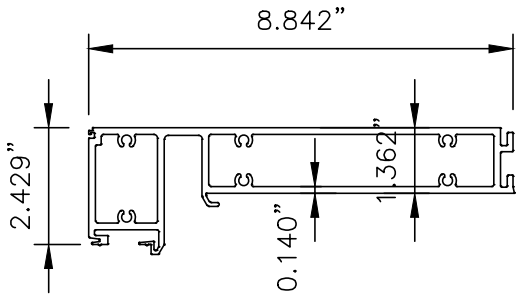
32 FIN ANCHOR LUG



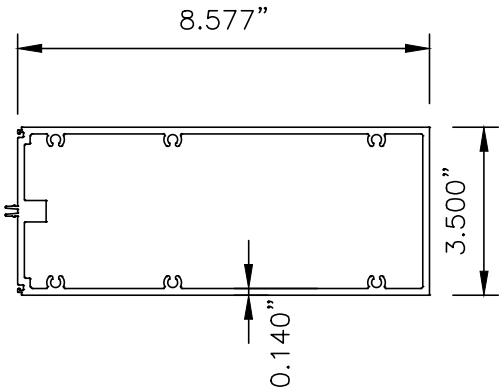
36 STACK HEAD



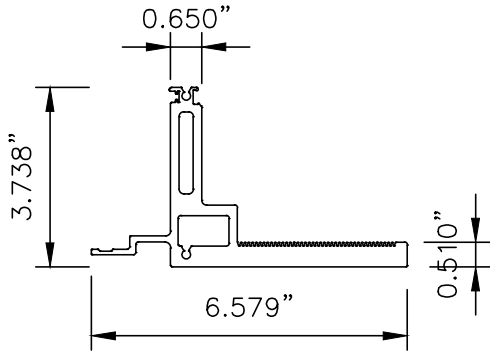
38 STACK SILL



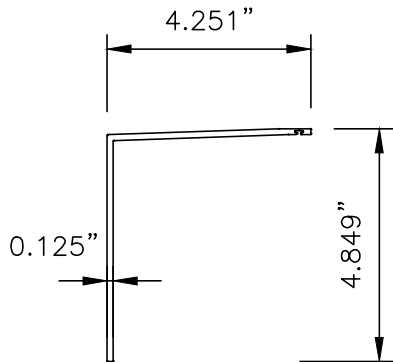
39 STACK SILL



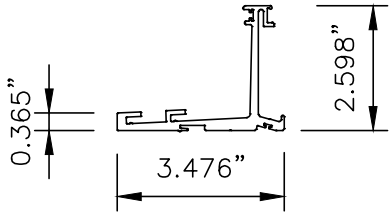
37 HORIZONTAL



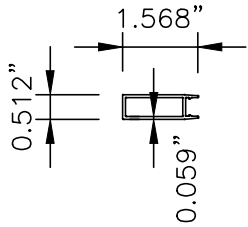
42 STARTER SILL



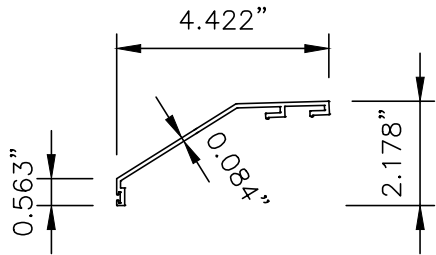
44 STARTER SILL TRIM



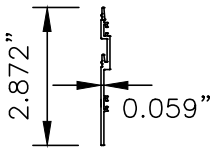
45 CHICKEN HEAD



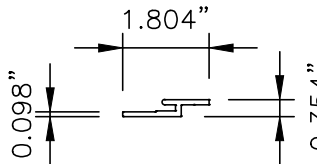
49 HORIZONTAL GLAZING TRIM



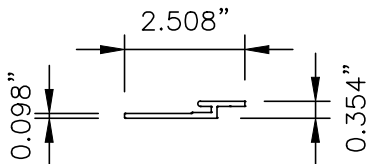
51 HEAD TRIM



54 MULLION GLAZING ADAPTOR (INS)



56 SETTING BLOCK CHAIR (MONO)



57 SETTING BLOCK CHAIR (INS)

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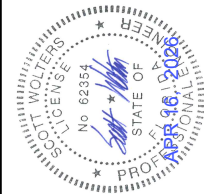
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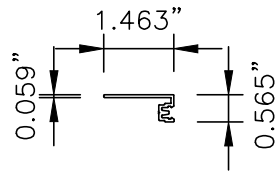
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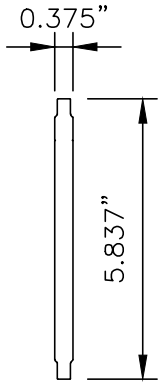
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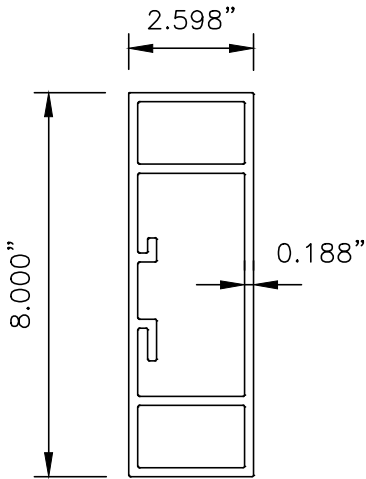
EXTRUSION PROFILES



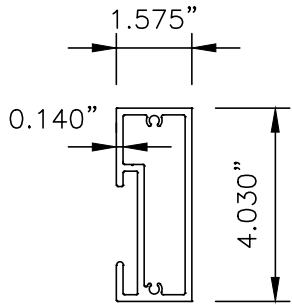
58 SETTING BLOCK CHAIR



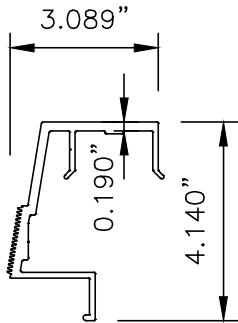
59 MULLION LIFTING LUG



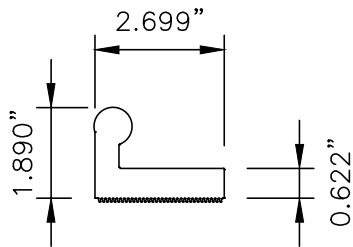
62 UHPC 4" RAIL



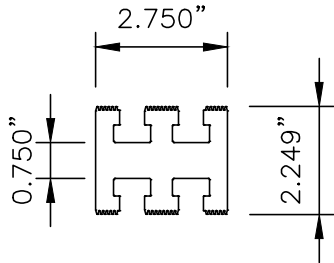
63 UHPC SPACER BLOCK



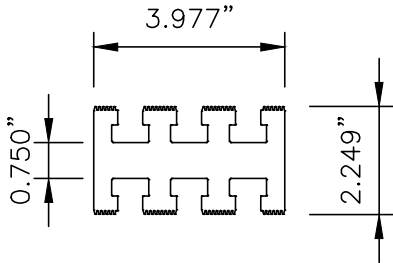
64 UHPC CLIP



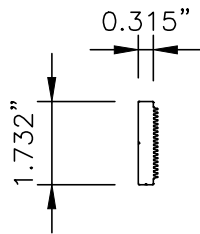
66 ANCHOR SLED



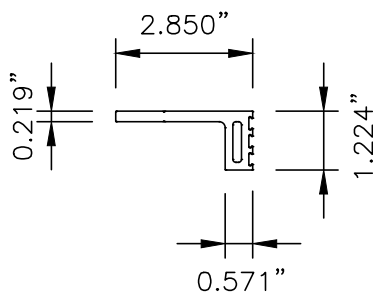
67 ANCHOR BRIDGE



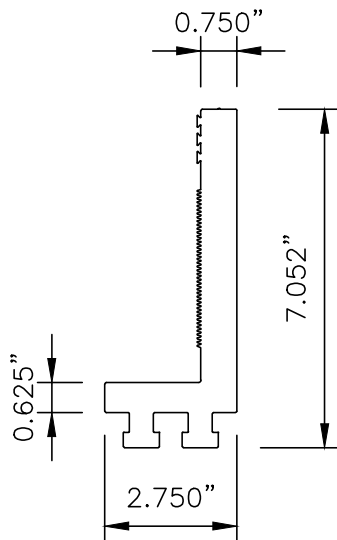
68 ANCHOR BRIDGE



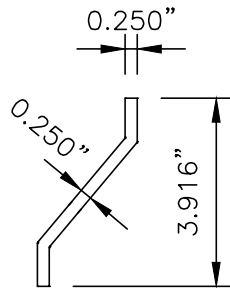
69 NUT BAR



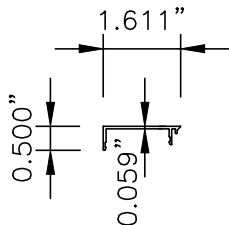
71 LIFTUP CLIP



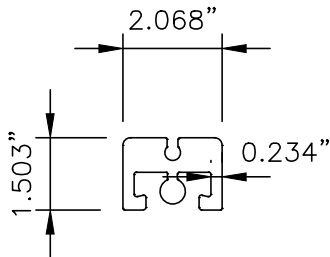
72 BASE ANCHOR CLIP



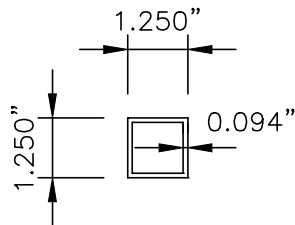
73 Z PLATE



74 ZIPPER MULLION TRIM



78 ANCHOR SLIDE



80 ALUMINUM TUBE

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CHICAGO, IL 60601

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SEAL:

SCOTT VOLTERS
FL PE# 62354

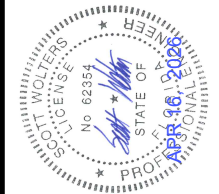
VOLTERS ENGINEERING

(CDA# 27194)

15211 97TH ROAD N

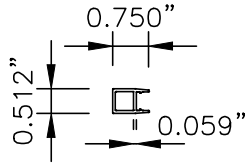
WEST PALM BEACH, FL 33412

(561) 225-1982

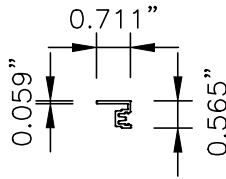


REV #	PRINTS ISSUED FOR
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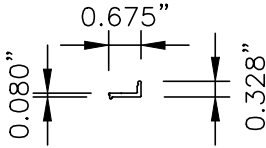
EXTRUSION PROFILES



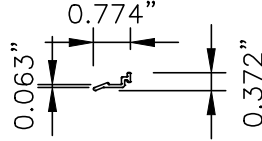
83 HORIZONTAL GLAZING TRIM



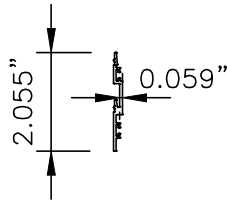
87 SETTING BLOCK CHAIR



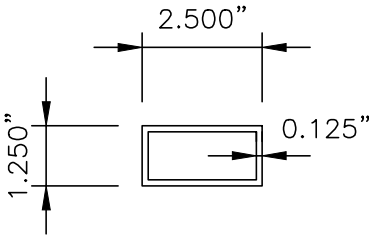
88 ZIPPER MULLION CLIP



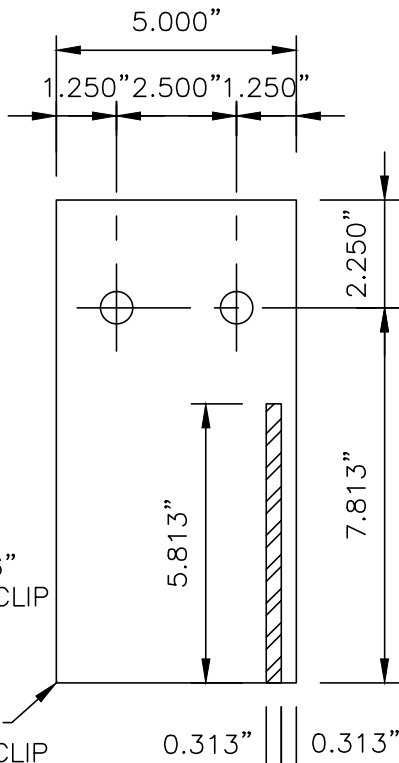
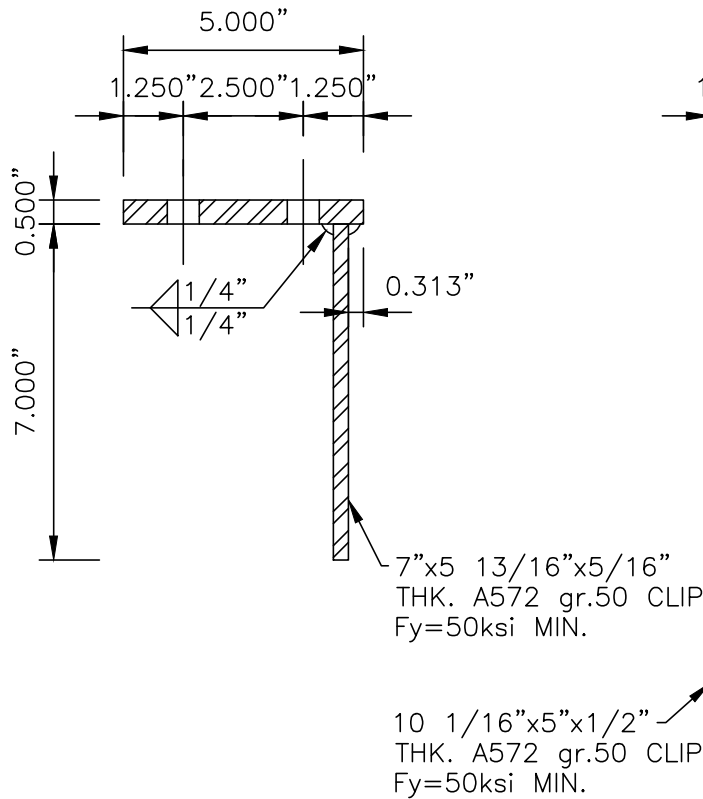
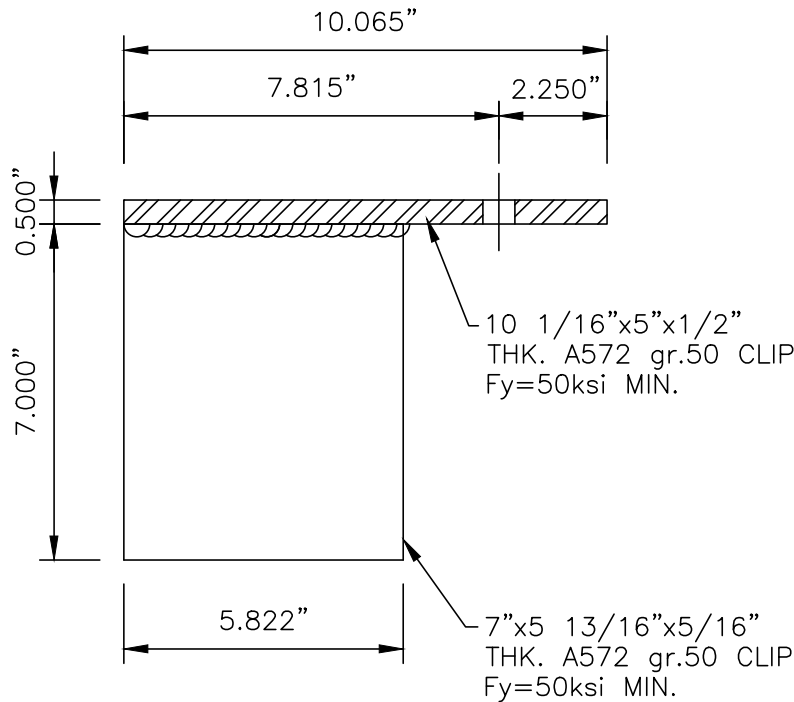
89 CLIP



91 MULLION GLAZING ADAPTOR (MONO)



95 ALUMINUM TUBE



99 SINGLE SPAN MULLION HEAD CLIP

NOTE:
MALE MULLION HEAD CLIP SHOWN
FEMALE HEAD CLIP OPPOSITE

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